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132, Number 1



CHOMATES M

July, 1967

Beginning . . .

A Glossary of Chromosomal & Genetic Terms

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- Also -

Summary of Actions, 1967 House of Delegates



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You might also say that all registered nurses aren't alike, either.







Illinois Medical Journal

volume 132, number 1

july, 1967

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The president's page



Newton DuPuy, M.D.

The Illinois State Medical Society one year ago reported the preliminary results of a Membership Opinion Survey conducted by the Opinion Research Institute of Princeton, N.J. As I indicated in my written report to the House of Delegates, it is my conclusion that the results of the survey indicated a "malignant apathy," which is in existence in many organizations, not necessarily limited to medical organizations such as the ISMS.

The structure and activities of a professional organization obviously change with respect to the demands of the times, but more importantly with respect to the demands of its members. For a moment I would like to discuss what I see ahead for our association, keeping in mind that the Opinion Research study will continue to be used as a guideline for our future development.

No one can seriously disagree with the conclusion that all professional and technical associations will in the next 10 years undergo great structural and functional change; perhaps the most compelling force for that change is that imposed by the federal government. Today the centralized federal government is larger, more powerful and more forceful than yesterday. Tomorrow it will be larger still. To cope successfully with government, the professions will be forced to rely more and more on their associations. The individual member, or unit of medicine will simply not be able to

finance the necessary staffing pattern in Washington or in our state capital to represent himself, or itself satisfactorily before government agencies or legislative bodies. It is my conclusion that those of us in the private practice of medicine will have to turn to our representative medical associations for collective representation. We may even have to join together our specialty groups, or state medical societies in order to more effectively develop legislative knowhow and understanding. In this respect we may have to follow the lead of private industry where their associations have begun to pool and to merge their capabilities.

The growth of associations will be continuous and will not necessarily be limited to large national associations, for local and state governments, and that newest development, the regional government office will soon force local state and regional associations to parallel the development of national associations. The government bureaus have already indicated a certain amount of impatience with having to deal with multiple associations representing the various facets of industry and the professions. Government, therefore, will increase the pressure for representative groups and try to end their frustration of having to listen to many multiple agencies.

Furthermore, government has begun to compete with organizations. Today we are

(Continued on page 16)

Abstracts of Board Actions

May 20, 22, 23 and 24, 1967

HEALTH CAREERS COUNCIL TO RECEIVE ISMS CONTRIBUTION

In response to its urgent plea for financial support, the Health Careers Council of Illinois will receive a \$20,000 contribution from the Illinois State Medical Society this year. The 1967 House of Delegates approved a reference committee recommendation that the amount be supplied for one year, and the ISMS Board of Trustees, which is responsible for expending the society's funds, subsequently voted to take \$2 per member from AMA-ERF and give it to the Health Careers Council, as proposed by the House action. The Board expressed hope that the amount withheld from AMA-ERF this year could be found from some other source and returned to the medical school fund as soon as possible.

AMA-ERF CONTRIBUTION IS INTEGRAL PART OF ISMS DUES

In another action related to dues, the Board ruled that the \$20 AMA-ERF contribution (some of which will go to the HCCI this year) is no longer voluntary but is an integral part of the ISMS dues structure. The Board stated that to be in good standing a member must pay the full \$105, the amount set by the House of Delegates as annual dues, and he cannot deduct \$20 to send directly to the school of his choice. Dues statements do provide members with an opportunity to specify which schools they would like to receive this part of their dues.

BOARD MINUTES AVAILABLE ON WRITTEN REQUEST

The Board has decided that, because of the expense involved in mailing complete minutes of its meetings to all members of the House of Delegates and county medical society secretaries, only abstracts of the minutes will be sent to these individuals now. It was pointed out that any member of the society will be sent the complete minutes upon written request. The Board further pointed out that no action reported in the minutes or abstracts is official until the Board approves the minutes at a subsequent meeting.

BELL TO WORK ON REVISION OF AMA PUBLICATION

C. Elliott Bell, M. D., chairman of the Committee on Relative Value, has been authorized to meet with Dr. Burgess L. Gordon, of the AMA Division of Scientific Activities, to work on revision of <u>Current Procedural Terminology</u>, the AMA publication of definitions used in determining usual and customary fees for third-party payment of medical bills.

GOODYEAR RE-ELECTED CHAIRMAN OF BOARD

Dr. Arthur F. Goodyear, Seventh District Trustee, has been re-elected Chairman of the Board of Trustees. New members of the Board are Dr. James B. Hartney and Dr. Warren W. Young, Third District, and Dr. George E. Giffin, Second District. Dr. Young is filling the unexpired term of Dr. Philip G. Thomsen, new president-elect of the society, and Dr. Giffin replaces Dr. Ralph N. Redmond, who has resigned.

See Page 63 for Summary of House Actions

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Precautions: In the elderly and debilitated, and in children over six, limit to smallest effective dosage (initially 10 mg or less per day) to preclude ataxia or oversedation, increasing gradually as needed and tolerated. Not recommended in children under six. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (e.g., excitement, stimulation and acute rage) have been reported in psychiatric patients and hyperactive aggressive children. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

Adverse Reactions: Drowsiness, ataxia and confusion may occur, especially in the elderly and debilitated. These are reversible in most instances by proper dosage adjustment, but are also occasionally observed at the lower dosage ranges. In a few instances syncope has been reported. Also encountered are isolated instances of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido—all infrequent and generally controlled with dosage reduction; changes in EEG patterns (low-voltage fast activity) may appear during and after treatment; blood dyscrasias (including agranulocytosis), jaundice and hepatic dysfunction have been reported occasionally, making periodic blood counts and liver-function tests advisable during protracted therapy.

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for July, 1967

President's Page

(Continued from page 7)

seeing a growing number of instances where government has entered the association field by providing services for business, industry, and the professions which have been customarily the responsibility of volunteer associations. For this reason governmental competition will force us and other associations to more critically analyze our functions and programs. An additional problem which will emerge will be the need for associations to gain greater political strength, and here we may well expect our membership to have some controversy. But I suspect that we will be able to meet this challenge.

Associations like ours will soon be structured and staffed more adequately than they have been in the past. Our professional association executives must be given far greater responsibility tomorrow than they are given today. As trained business experts the association executives will guide our organization as closely as possible in conformity with the policies established by the House of Delegates. It is for this reason that we must consider carefully the selection of our future executive administrator.

In the implementation of recommendations which will be submitted by our Task Force throughout the next year, we will need much courage. Many programs and projects of our association have become unnecessary and outdated. Some are even duplicated by the government, and/or other organizations. It is going to take wisdom to evaluate our programming, and great courage to abolish activities which are no longer vital. The pet project will have to be discarded, even though it may attract a very loyal group of our members. Objectivity in evaluating our program will have to mark our path as we intelligently allocate our financial and human resources.

The giant problem which we have is that which decides our general policy. In the

future it will be difficult to guarantee that all of our policies are properly based and satisfactory to all concerned. And naturally a corollary problem is that of internal politics with respect to the selection of well equipped and capable officers and delegates of the county and state societies. We must in the future make certain that our policies are in the best interest of the profession, and are controlled by seasoned and well trained officers, as well as executive staff.

An extraordinary difficult task confronts the association and the association executive staff, and this is the ability of its leaders to challenge their own assumptions. Associations and their officers, as well as each of us as individuals develop a vast storehouse of folklore. Some of this folklore is still valid, but much never was, and never will be valid. We must in the future adopt our position based on reality. Successful associations in the future will be geared to tomorrow's possibilities, not yesterday's mythology. There are too many mythological beasts grazing on association land. The future association officers and executives must lead their organization to deal with "things as they are" and not live by the old cliches. We must chase the unicorns from our gardens.

One final development which I see in the future is that we will demand greater participation by more people than ever before. A greater personal involvement by members is very likely because our association will assume much greater importance in each of our member's lives. Our members have to become more involved because their success will depend much upon the success of the association, and the association will directly reflect the sophistication of our profession.

It is my hope that our sophistication will enhance the furtherance of organized medicine throughout the width and breadth of this nation. Much the same as we have in the past, so Illinois can set the standard and lead in the future.

Reference Issue Postponed

The annual reference issue of the *Illinois Medical Journal*, which usually appears in August, will not be published this year until some time in the fall. The delay is necessitated by the reorganization of the Illinois State Medical Society's committee system approved by recent House of Delegates action.

LOW-RACK DAIN A CONSERVATIVE, FOUR-POINT PROGRAM

The low back pain that is most frequently seen in general practice is mechanical in nature, i.e., postural back pain, joint dysfunction and acute back strain. For this type of discomfort, a conservative regimen is usually sufficient to relieve aches and pains, and to help keep the patient functioning. Components of this basic program include:



Upholding Professional Ethics

The medical professional should safeguard the public and itself against physicians deficient in moral character or professional competence. Physicians should observe all laws, uphold the dignity and honor of the profession and accept its self-imposed disciplines. They should expose, without hesitation, illegal or unethical conduct of fellow members of the profession.

- 1. UPHOLDING THE HONOR OF THE PROFESSION. A physician is expected to uphold the dignity and honor of his vocation. (Principles of Medical Ethics, 1955 edition, Chapter III, Section 1.)
- 2. SAFEGUARDING THE PROFES-SION. Every physician should aid in safeguarding the profession against admission to it of those who are deficient in moral character or education. (Principles of Medical Ethics, 1955 edition, Chapter III, Section 3.)
- 3. RESPECT OF PATIENT'S TRUST. It is unethical and contrary to Section 4 of the Principles for a physician to be false in any manner to the trust imposed in him by his patients. (House of Delegates, 1960.)
- 4. NEGLECT OF PATIENT. It is unethical and contrary to Section 4 of the Principles for a physician to neglect his patients. (House of Delegates, 1960.)
- 5. UNNECESSARY SERVICES. It is unethical and contrary to Section 4 of the Principles for a physician to provide or prescribe unnecessary services or unnecessary ancillary facilities. (House of Delegates, 1960.)
- 6. EXPOSURE OF UNETHICAL CON-DUCT. A physician should expose, without fear or favor, incompetent or corrupt, dishonest or unethical conduct on the part of members of the profession. Questions of such conduct should be considered, first, before proper medical tribunals in executive sessions or by special or duly appointed committees on ethical relations, provided, such a course is possible and provided, also, that the law is not hampered thereby. If doubt should arise as to the legality of the physician's con-

- duct, the situation under investigation may be placed before officers of the law, and the physician-investigators may take the necessary steps to enlist the interest of the proper authority. (Principles of Medical Ethics, 1955 edition, Chapter III, Section 4.)
- 7. EVASION OF LEGAL RESTRICTIONS. An ethical physician will observe the laws regulating the practice of medicine and will not assist others to evade such laws. (Principles of Medical Ethics, 1955 edition, Chapter I, Section 11.)
- 8. MEMBERSHIP IN MEDICAL SO-CIETIES. For the advancement of his profession, a physician should affiliate with medical societies and contribute his time, energy and means so that these societies may represent the ideals of the profession. (Principles of Medical Ethics, 1955 edition, Chapter III, Section 2.)
- 9. OBLIGATIONS OF COUNTY MEDICAL SOCIETIES. The Council has emphasized the autonomy of the county society and the fact that such autonomy imposes responsibilities. If medical societies fail to accept and discharge their obligations in matters of ethics, others will assume these obligations by default. The Judicial Council urges county and state societies to adopt critical attitudes toward their programs to "uphold the honor and dignity" of the profession of medicine. These programs must be based on a sound knowledge and understanding of ethical principles. As long as ethical principles are widely and sedulously observed, the reputation of the medical profession will be upheld. The reward will be commensurate with the services rendered in the observation of these ideals. On the other hand, if there is flagrant or even careless disregard of ethical principles, the reputation of the profession of medicine will suffer and its responsibilities and obligations will be usurped by others. (House of Delegates, 1958.)

(Continued on page 110)

Glossary of Chromosomal and Genetic Terms

By JACK P. COWEN, M.D.

PART I

The rapid increase of interest in genetic problems and recent progress in human chromosome analysis has introduced many new terms into the medical and ophthalmological vocabularies. Dr. Arthur R. Sohval of the Endocrine Research Laboratory and Clinic of the Department of Medicine, The Mount Sinai Hospital, New York City, N.Y., has reviewed, in the American Journal of Medicine, volume 31, September 1961, pages 397 ff., the problem, in the article "Recent Progress in Human Chromosome Analysis and Its Relation to the Sex Chromatin," and has included a complete glossary of cyto-genetic terms, which are very useful as a complete glossary of the terms continually reappearing in current ophthalmic literature.

Rapid developments in the use of atomic energy during and following World War II resulted in a considerable expansion in chromosome analysis, particularly in human beings. It was shown that the normal human chromosome number was 46 rather than 48. Extensive application of methods of nuclear sexing to clinical instances of hypogonadism and of various forms of intersexuality led to the unexpected discovery of discordance between nuclear sex and (chromatin-positive appearance somatic Klinefelter's syndrome, and the chromatinnegative Turner's syndrome, and the syndrome of testicular feminization). In addition, it was soon demonstrated that true hermaphroditism could be either chromatin-positive or chromatin-negative. Mindful of that fact that many physicians are unfamiliar with the esoteric and highly technical vocabulary that has arisen from the newer findings in cytogenetics and heredity, it was considered wise to append this list of terms, recalling the basic mechanisms and concepts.

GLOSSARY

Acrocentric: Type of chromosome in which the centromere is located near one end. At metaphase, it has the appearance of a "wishbone." Also called "SUBTERM-INAL."

Alleles: A pair of genes, situated at a corresponding locus of a pair of homologous chromosomes, having to do with a specific characteristic in the offspring. A pair of alleles are generally indicated by the same letter, using a capital for the dominant, and a lower-case letter for the recessive. An individual possessing a pair of identical alleles, either the two dominants or the two recessives, is "pure" for the character controlled by the gene and is therefore "homozygous" for this gene. The

From the Department of Ophthalmology Michael Reese Hospital and Medical Centre Chicago.

union of contrasting genes, a dominant and its recessive allele, usually results in a "heterozygous" individual. However, heterozygotes may also be codominant; e.g., hemoglobin S/C. The designations "dominant" and "recessive" regularly apply to the relationship of the two alleles to one another.

Allocycly: The specific differential staining reactivity of heterochromatin which permits its cytological recognition and distinction from the remaining euchromatic portion of the chromosome. This phenomenon is apparently related to the cycle of the union of nucleic acid with the protein complex of the chromosome. Accordingly, its expression varies in the different phases of the mitotic cycle. In the X- chromosome, it is most pronounced in prophase.

Anaphase: Phase of cell division characterized by the movement of chromosomes from the metaphase plate towards the opposite poles. In mitosis, it is the longitudinally-doubled chromosomes (chromatids) which separate. In the first stage of meiosis, whole chromosomes instead of chromatids segregate at anaphase. The second meiotic divi-

sion is essentially mitotic, with separation of chromatids. (Fig. 1) See MITOSIS.

Aneuploidy: State characterized by an irregular number of chromosomes, not an exact multiple of the basic number characteristic for the species. For example, the presence of 45, 47 or 48 chromosomes

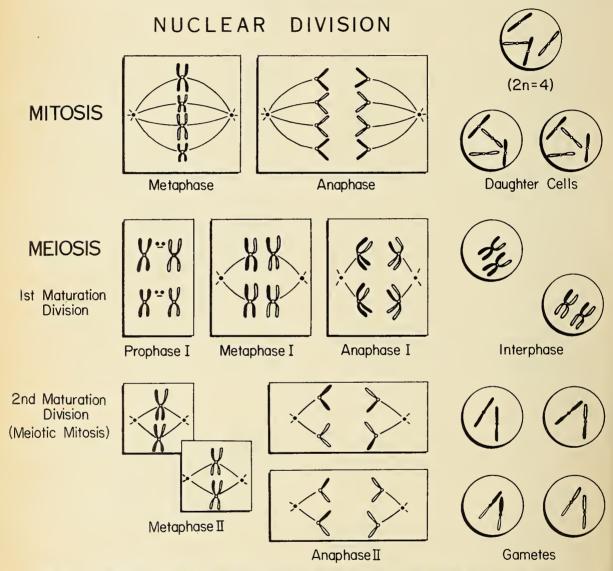


Fig. 1. (After Sohval) Highly schematic representation of the distinguishing features of mitotic and meiotic division. The parent cells contain two pairs of chromosomes, the dark and light members of each pair being derived from the mother and father respectively. In mitotic metaphase, each chromosome is reduplicated and arranged separately on the equatorial plate. During anaphase, the longitudinal halves of the chromosomes separate and pass to opposite poles producing daughter cells whose chromosomal constitution is identical with the parent cells. At metaphase of the first meiotic division, the reduplicated members of each homologous pair are together in synapsis on the equatorial plate. Exchange of chromosomal material (crossing over) has just taken place during prophase. During anaphase, whole reduplicated chromosomes of each pair diverge poleward to produce daughter cells containing half the diploid number. Metaphase of meiosis II is essentially mitotic in character, resulting in gametes containing the haploid number of chromosomes, but with varying compositions of parentally derived chromosome material.

in man, caused by the loss or addition of one or more chromosomes. Such conditions are also known as HYPOPLOID, and HY-PERPLOID, respectively. See MONO-SOMIC, TRISOMIC.

Autosome: A non-sex chromosome, often called HETEROSOMES. Man has twenty-two pairs of autosomes and two sex chromosomes (XX or XY).

Centric Fusion: A special type of reciprocal translocation in which each of the involved chromosomes is broken very close to its centromere so that exchange of virtually entire, or even entire chromosome arms takes place ("whole-arm" translocation). When both of the involved chromosomes are acrocentric and breakage occurs in the long limb of one and in the short limb of the other, transposition of the arms pro-

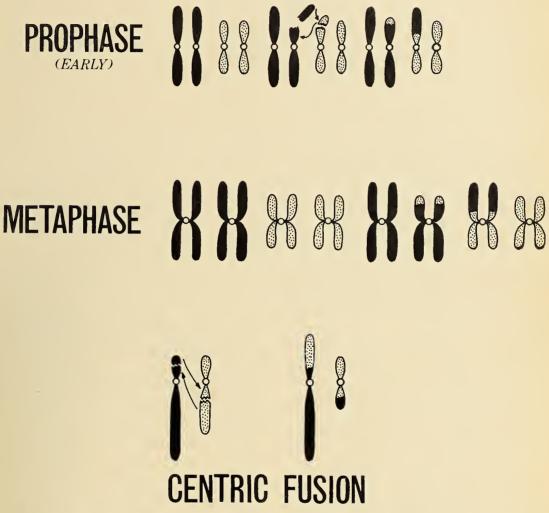


Fig. 2. (After Sohval). (Top) Diagram illustrating reciprocal translocation involving the exchange of parts of non-homologous chromosomes early in prophase. (At this stage, the chromosomes are actually threadlike, longer and longitudinally reduplicated). (Middle) Diagrammatic representation showing how the morphology and composition of two pairs of homologous chromosomes at metaphase is altered by reciprocal translocation. The resulting dissimilarity (in size and centromere position) between original members of the two homologous pairs is a potential source of error in the identification of individual chromosomes during karyotype analysis. (Bottom) Schematic illustration of the mechanism of CENTRIC FUSION. This is a special type of reciprocal translocation involving non-homologous aerocentric chromosomes. Breakage close to the centromere occurs in the short arm of one chromosome and in the long arm of the other. Of the two newly produced chromosomes, one is necessarily a minute fragment which is usually lost in subsequent cell division.

duces a large submedian chromosome and a minute element containing a centromere, and a very short region on either side. (Fig. 2) Since each new chromosome possesses a centromere, it is potentially viable. However, the minute fragment tends to be lost in subsequent generations. Thus centric fusion followed by loss of the minute element leads to a decrease in the basic chromosome number.

Centromere: A non-staining apparently structureless constriction visible in chromosomes during prophase, metaphase and anaphase. It produces the so-called "primary constriction" of each chromosome and is the region at which the latter becomes attached to the spindle. Its position, which may be median (metacentric), submedian (submetacentric), or acrocentric (near one end), is constant for a given chromosome and determines its form. Accordingly, it assists in the identification of individual chromosomes. Also termed KINETOCHORE.

Chiasma: The point of contact between non-sister chromatids of paired homologous chromosomes, seen during the prophase of the first meiotic division. It is the cytologic expression of completed genetic crossing over, the latter providing for the exchange of genic material between two chromosomes before they separate.

Chimera: An organism, usually a grafted plant, exhibiting a mixture of genetically different types lying adjacent to one another. This term has been applied to human subjects (twins) possessing more than one blood group: i.e., mixtures of A and O cells, who therefore exhibit ERYTHRO-CYTE MOSAICISM.

Chromatid: During nuclear division, each chromosome presents a longitudinally-double form, each half of which is known as a chromatid. The components of a single chromosome are SISTER CHROMATIDS and are held together at the centromere. When they separate at mitotic anaphase, they are called DAUGHTER CHROMOSOMES.

Chromatin: The substance in nuclei and chromosomes which stain intensely with basic dyes. It is composed of DNA com-

bined with proteins. In the fixed intermitotic nucleus, it usually takes the form of an irregular network of long coiled threads. Larger and denser chromatin particles are known as CHROMOCENTERS. As a cell undergoes division, the delicate coils of chromatin material are gradually transformed into individual chromosomes. In numerous species, the sex chromosomes are especially rich in heterochromatin, which maintains its capacity for staining in the resting nucleus, as opposed to euchromatin, which loses this staining ability then. Presumably this is the basis for the possibility of distinguishing male from female cell nuclei by means of the "sex chromatin."

Chromatin-Negative: Refers to nuclei which lack Barr's sex-chromatin mass. This state is characteristic of the normal human male.

Chromatin-Positive: Refers to nuclei containing the distinctive sex-chromatin body of Barr. It is present in the normal human female.

Chromocenter: These are deeply staining clumps of chromatin material present in inter-mitotic nuclei. A chromocenter of characteristic size and shape lying in contact with the nuclear membrane is present in females of many species, including man. It is known as the SEX-CHROMATIN BODY OF BARR.

Chromosome: One of the finite number of small bodies occurring in pairs into which the chromatin material of a cell nucleus resolves itself prior to cell division. Chromosomes are not visible as such, except during cell division. HOMOLOGOUS chromosomes are the two members of one pair, one of maternal, one of paternal origin. At metaphase, the longest human chromosome measures approximately 8 to 10 microns, and the smallest 1.2 to 1.5 microns. It is the unit structure bearing the carriers of hereditary traits, the genes. The morphologic characteristics of the individual chromosome and their total number is constant for all the somatic cells of a given species. Its major chemical components are DNA, RNA, histones and nonhistone proteins.

Chromosome Aberration: Deviation from the normal number or structure of chromosomes.

Codominant (Combinant): Refers to alleles whose effects are recognizable side by side, without one's being influenced by the other.

Consanguinity: Blood relationship, this is, possession of common ancestors in the preceding few generations of the ascending line.

Clone: A group of cells constituting the progeny of asexual reproduction from a single sexually-produced cell. The clone is of importance in mosaicism in which genotypically different ancestral cells give rise to genetically dissimilar stem-lines of daughter cells.

Crossing Over: The exchange of chromatic material between synapsed chromosomes during prophase of the first meiotic division. Occurring when the chromosomes are longitudinally double, the event involves non-sister chromatids and not whole chromosomes. It takes place between, not at, the loci of genes. The process is responsible for new recombinations of genes in the gametes which differ from the parental gene combinations in the original germ cells.

Deletion: A chromosomal aberration characterized by detachment and loss of a portion of a chromosome by breakage. In this manner, one or more genes may be removed from the organism. The deleted portion fails to survive if it lacks a centromere.

Deoxyribonucleic Acid (DNA): Essential component of the cell nucleus which carries the genetic information. The DNA molecules are composed of nucleotides in the form of a chain. Each nucleotide contains an organic base (adenine, guanine, thymine, and cytosine), a sugar (deoxyribose), and phosphate. The specific nature of the genes is based on the specific sequence of base pairs in the DNA molecule.

Diploid: The number of chromosomes present in all somatic and primitive germ cells of a species. It is referred to as "2n" where "n" signifies the HAPLOID (half) number, which is found in gametes.

Dominant: This classically refers to a gene which produces its effect despite the presence of an opposite or contrasting gene. Dominance and recessivity are complementary concepts. A gene is not dominant or recessive in itself but only in its behavior with respect to a certain allele. In human genetics, the homozygous state of "dominant" anomalies is usually unknown. Here it is customary to speak of dominance if a gene has a distinctly recognizable pathological effect even in the heterozygous state, without considering whether this effect is equal to that of the homozygous state. "Dominant" genes in this sense presumably often have a more pronounced effect in the homozygous than in the heterozygous state. For the more specific characterization of the dominant gene effect, the following designations can be used:

Completely Dominant: applies to a gene whose heterozygous state cannot be distinguished from its homozygous state.

Conditionally Dominant: applies to a gene only the heterozygous state of which is known, this state being markedly different, however, from the homozygous state of the other allele.

Intermediately Dominant: applies to a gene which has a weaker effect in the heterozygous state than in the homozygous state (the expression has the same meaning as "semidominant, partially dominant, or incompletely dominant").

Irregularly Dominant: applies to a gene whose heterozygous state is not always recognizable. The greater the irregularity of the gene effect, the more questionable it is whether this is really due to a "dominant" gene and not rather to a more complicated genetic mechanism.

Duplication: A type of chromosomal aberration characterized by the presence of an extra segment of chromosome which may exist as a separate fragment, or may be attached to one of the members of the ordinary chromosomal complement. This is to be distinguished from ANEUPLOIDY and POLYPLOIDY, in which variations in somatic chromosome numbers are irregular or exact multiples, respectively, of the basic chromosomal number.

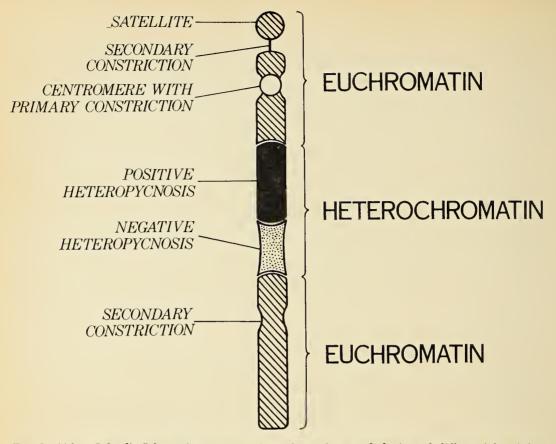


Fig. 3. (After Sohval) Schematic representation of certain morphologic and differential staining characteristics found in some but not all chromosomes. (A centromere and its primary constriction are present in ALL human normal chromosomes). See Glossary for explanation of terms.

Equational Division: The second meiotic division, essentially mitotic in type, characterized by the separation of sister chromatids. The latter are genetically identical since they are longitudinally-split reduplications of individual chromosomes. (Fig. 1)

Equatorial Plate: A circular disc-like area situated at right angles to the spindle fibres of the dividing cell. On it are arranged the chromosomes preparatory to their separation (in meiosis I) or to the separation of their chromatids (potential daughter chromosomes) in mitosis, and in meiosis II. Also known as METAPHASE PLATE.

Euchromatin: The chromatin material composing a chromosomal segment which exhibits no variation in staining intensity (iso-pycnosis) or in condensation at any time during the mitotic cycle. (Fig. 3.) Most if not all genes directly responsible for hereditary transmission are believed to

be situated in this type of chromatin. Contrasted with HETEROCHROMATIN.

Euploidy: A state in which there is a balanced set of chromosomes. This includes variations in the somatic chromosomal number, characterized by the presence of the exact multiples of the basic number of that species. Accordingly, these may be the HAPLOID (MONOPLOID), DIPLOID, TRIPLOID, TETRAPLOID and higher multiple numbers. Complements higher than diploids are called POLYPLOIDS.

Expressivity: The regularity in different individuals with which a gene produces a trait. Fluctuation in the degree of distinctness of a feature are explained by the "expressivity of the responsible gene." Low expressivity (low distinctness of a feature) passes continuously into "missing penetrance" (the feature is no longer recognizable).

(To be continued next month)

Diastrophic Dwarfism

By Robert J. Walsh, M.D./Chicago

In 1960, Lamy and Maroteaux² reported three cases that they considered to be a newly described entity which they called diastrophic dwarfism, from the Greek, diastrophos, which means twisted. They also reviewed the literature and found 11 prior cases which had been reported under different diagnoses and which they considered to be diastrophic dwarfism. At least 12 additional cases have been reported since 1960.1.3.4.5,6,8,9. Rubin⁷ classifies this entity as an epiphyseal dysostosis and states that further reports containing serial roentgenograms are necessary. The present case contains two series of roentgenograms taken four years apart.

CASE REPORT

This patient is a girl born Nov. 22, 1960, after an uneventful pregnancy. There are no other siblings. The maternal grandmother had "short arms." There are no other known deformities in the family history.

On physical examination in November, 1961, at 12 months of age, she was found to have shortened extremities, limited motion of the proximal interphalangeal joints of some fingers, hyperextension of both thumbs and the right knee, bilateral equinovarus deformities of the feet, the right more severe than the left. There was no cleft palate. There was only slight irregularity of the external ears. There was a small cutaneous hemangioma on the left buttock.

Roentgenograms taken in November, 1961, revealed distortion of the hips (Fig.

This case report from the Department of Surgery, Division of Orthopedics, University of Chicago Hospitals, was prepared by Dr. Robert J. Walsh, who is now in the Department of Orthopedic Surgery at Northwestern University and is associated with the Field Clinic in Chicago. He is on the staff at Ravenswood, Children's Memorial and Cook County Hospitals.

1), short, broad metacarpals (Fig. 2), and some irregularity of the metatarsals (Fig. 3). There was no scoliosis (Fig. 4). The lumbar vertebrae were not shortened (Fig. 5).

Her equinovarus foot deformities were treated by multiple casts and an adequate correction was obtained in the left foot but not in the right. In November, 1961, a right Achilles tendon lengthening and a posterior capsulotomy of the right ankle joint were done with a good result.

In August, 1965, at age 4 years 9 months, she was again admitted because of recurrent right equinovarus deformity. She also had recurrent subluxations of the right knee, for prevention of which she wore a long leg brace. Her height was found to be below the third percentile for her age, and her weight was on the third percentile. Her head circumference was that of a two-year old. Her projected height at age 12 was that of a five to six-year old child.

Roentgenograms at this time again revealed distortion of the hips (Fig. 6) and short, broadened metacarpals (Fig. 7). The metatarsals showed more marked irregularities (Fig. 8). There was now a scoliosis present (Fig. 9). The lumbar vertebrae showed no flattening (Fig. 10). The right knee (Fig. 11) showed subluxation.

At this time her right Achilles tendon was again lengthened and a posterior capsulotomy of the right ankle joint was performed, combined with a lateral transfer of the right anterior tibial tendon. The result was satisfactory.

DISCUSSION

From an analysis of the previously reported cases the prominent clinical features of this entity are seen to be dwarfism, club feet, and a scoliosis which becomes prominent on weight bearing. There are



Fig. 1 Roentgenogram of pelvis, November, 1961, age 12 months.



Fig. 2 Roentgenogram of right hand, November, 1961.



Fig. 3 Roentgenogram of both legs and feet, November, 1961.

associated rigid and lax joints with extremes from virtual fusion to subluxations. The hands (Figs. 12 and 13) are characteristically shortened with hypermobile thumbs and rigidity of the proximal interphalangeal joints of the fingers. The external ears are frequently thickened and misshapen. More rarely, there is a cleft palate.

On roentgenograms the epiphyses and their associated joints are distorted. Subluxation of joints is seen. Metatarsals, meta-



Fig. 4 Roentgenogram of vertebral column, November, 1961.



Fig. 5 Roentgenogram of lumbar vertebrae, November, 1961.



Fig. 6 Roentgenogram of pelvis, August, 1965, age 4 years, 9 months.



Fig. 7 Roentgenogram of both hands, August, 1965.



Fig. 8 Roentgenogram of both feet, August, 1965.



Fig. 9 Roentgenogram of vertebral column, August, 1965.



Fig. 10 Roentgenogram of lumbar vertebrae, August, 1965.



Fig. 11 Roentgenogram of right knee, August, 1965.

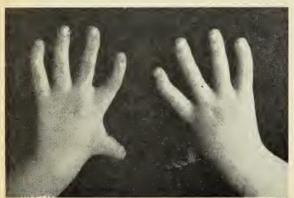


Fig. 12 Dorsal view of both hands, August, 1965. The skin folds over the proximal interphalangeal joints are reduced or absent. The thumbs can be hyperextended.



Fig. 13 Volar view of both hands, August, 1965. Flexion of the proximal interphalangeal joints of the index, long, and ring fingers is limited or absent.

carpals, and phalanges are short and thick; the first metacarpal is usually globular or triangular. The vertebrae are of normal configuration but there is a scoliosis of the vertebral column. The skull is normal.

This entity has been classified by Rubin as an epiphyseal dysostosis since the main osseous defect seems to be in the epiphyses and their related articulations. It differs from achondroplasia, with which it has frequently been confused, since achondroplasia is a physeal dysostosis. Also, in achondroplasia there are abnormalities of the skull, pelvis, and vertebrae which are not present in diastrophic dwarfism. And, in diastrophic dwarfism there are club feet and scoliosis, which are not found in achondroplasia.

Thus, if one sees a patient with dwarfism, club feet, and scoliosis, diastrophic dwarfism should be considered as a possible diagnosis.

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Plastic Surgery In The U. S. S. R.

By Hugh A. Johnson, M.D., M.S./Rockford

Sherlock Holmes was born in the brain of a physician, A. Conan Doyle, and as a good diagnostician Holmes-Doyle drew conclusions from many dovetailing bits of evidence. With Holmes in mind as a model and applying observation and deduction to the body politic instead of the human body, I made a second trip to the U.S.S.R., this time with a group of Canadian and American orthopedic and plastic surgeons.

Before becoming specific, I must make some generalizations to avoid misunder-standing. One cannot deny the stupendous step from serfdom to the space age made by the Russians in less than half a century. I'll not discuss the means by which this was accompanished. Similar advances have been made in the field of plastic surgery, but great as their advances have been they are now only at about the level we had reached after World War I.

Plastic surgery as a discrete and identifiable specialty doesn't exist in Russia—with one exception, Limberg's Clinic in Leningrad—elsewhere stomatologists do the cleft lip and palate work and traumatologists do the burns, facial fractures, hand surgery, etc. In order to see plastic surgery as the rest of the world knows it, one must seek out clinics treating patients in each catagory.

Filatof's Pedicles Numerous

Professor Limberg is a fine old gentleman, a contemporary and friend of Sir Harold Gillies, Frederick Figi, Rainsford Mowlen, Professor Kilner and other great men of that era. He has several alert young surgeons, including his daughter, working with him. His clinic is old (but well kept up). Wards are eight bed affairs comprising a total, though, of but 30 beds. A variety of cases were shown and, in general, good work was being done, but again on a par with the work here between wars. Filatof's pedicles (tubed pedicles -Filatof was a Russian) were numerous and of excellent quality. I couldn't understand how they achieved such pliability until I learned that some of the tubes were nearly two years old and the patients had been hospitalized during that time! At other centers I also learned that they think nothing of two years' hospitalization. Some pedicles were heroic, but I think most all of our modern plastic surgeons would agree with me that if one is about to use a tube pedicle one should study the problem again as there must be a better way.

Defer Cleft Palate Repair

Repair of cleft palates was deferred until the age of 10 years, obturators being worn from shortly after birth. Limberg said speech results were excellent, but it was hard to judge for I speak no Russian. Nothing was said about the psychological aspects of this delay. In general, the impression was given that hospitalization time and the individual meant nothing; the squandering of them justified the result. One point we all found very novel was the shifting of large sections of upper and lower jaws by drilling multiple holes (removing about half of the cortex) in the cortical plates after reflecting the mucous membrane, waiting two weeks, and then beginning extensive orthodontia. Photographs confirmed the efficacy of this method as the results were excellent. Professor Limberg had several ears under construction using diced cartilage for framework, a method given up here long ago.

Professor W. N. Bolchin at the Central Research Institute of Traumatology and Orthopedics in Moscow has a central research unit for hand surgery. He has access to any type of case in any quantity from all the other research institutes in the U.S.S.R. With such a unique setup, one would expect much, but the cases were disappointing—pedicle flaps were inadequate and, in general, imagination was lacking. We were shown thumbs constructed from tube pedicles and an autogenous bone post without sensitive tissue being added. As we all know, such thumbs cannot stand up (not even a "degloved" thumb covered in

such a manner) unless some sensitive tissue is added. I was told that they do stand up, that after two years of no use (no employment) without using the thumb, some sensation returns. In our society two years without employment would be difficult, but in any society imagine what the rehabilitation problem must be! When asked why the sensitive ulnar side of the ring finger was not transferred as a neurovascular pedicle, the answer was a flat "It doesn't work." Bill Littler, William Frankleton, and all the rest of our hand surgeons would be pretty hard to convince. I did not belabor the point.

I have visited many plastic surgical centers in England and the U.S. and at all I have found the visitee willing, if not anxious, to exchange ideas. Not once was I ever asked, "What do you do in your country?".

Work on Burns Imaginative

At the same Institute of Traumatology in Moscow, the work of Dr. R. L. Ginsberg on burns was the exception and most imaginative. She had a small series of extensive burns which had been immediately anesthetized on arrival at the casualty station using Halothane. After debriding and dressing, the patients are kept under anesthesia for two full days (until the painful period has passed) with the elimination of shock being the goal. She states that results so far have been excellent. Special anesthesiologists have been assigned to the clinic and work on three hour shifts. While she described this treatment, my mind flashed to the probably untoward reaction of the anesthesiologists with whom I work should this method prove effective! Also unique was Dr. Ginsberg's use of massive transfusions and replacement transfusion of three to four liters every few days for the serious, toxic burn. The large quantities of blood are available because of the use of cadaver blood,

Here at the Central Research Institute was a large tissue bank of proportions similar to the U.S. Naval Center at Bethesda. The Russians, however, were preparing entire large joints for transplantation. No finger joints had been used, although they had three cases using experimental metal joints such as Adrian Flatt has been using

so successfully in large amounts in rheumatoid hands.

In other cities less sophisticated clinics were visited, but Moscow and Leningrad, the largest cities, are the important cultural centers in the U.S.S.R.

Non-surgical Observations

Some non-surgical observations were interesting. Concerning the customs inspection on this trip—the group was led by an overt Canadian Communist—no check of the luggage was made at any time, whereas two years ago when I traveled alone, at customs I was forced to produce all my foreign currency for counting and my luggage was thoroughly searched even to the point of examining my clinical slides and threading before the light many feet of my clinical movies. Perhaps the stringency of their laws has relaxed, but the fact that we were Communist-led may have made the difference.

There seems to be a burgeoning black market. My daughter and I were approached no less than five times in a half mile walk down Gorky St., Moscow's main street, always by the same type of individual, a young student speaking good English who wished to exchange rubles for dollars at two times the official rate. Private enterprise (in one of its less desirable forms) comes to Russia!

All my observations led to the conclusion that, although a great advance has been made, the lack of contact with the rest of the world has hampered them much and led to research in problems that have already been solved. In an attempt to evaluate what I saw on a world scale, I would say that medicine in the U.S.S.R. ranks on a par with that of India (where I've worked while on two Fulbright assignments). However, in India there were islands of genius and perfection in the plastic surgical field (such as found in Bombay, Nagpur or Vellore) that surpass, in some ways, North America and Great Britain. But in closing, I must say that even though the horizons I saw were limited, the kindness of the individual Russian is remarkable. It is a pity that the language barrier is so great and that they are not free to visit plastic surgical centers outside of Russia.

Benign Teratoma of the Tongue

By EPHRAIM A. GRIER, M.D., AND ROBERT H. MACNERLAND, M.D./CHICAGO

Anderson states a teratoma is a true tumor arising from totipotent cells.1 It consists of three types of embryonic tissue: ectodermal-skin, teeth, or nervous tissue; mesodermal-connective tissue, vascular tissue, heart muscle etc.; endodermal tissue-respiratory or intestinal tract. They tend to occur in the midline of the body and rarely in the extremities. When a teratoma contains well organized tissues resembling limbs, the interesting question of fetus in foetu is brought up.2 Boyd states that it is not a true tumor in the strict sense of the word, but rather an attempted formation of a new individual within the tissues of the patient.3 Ewing classified teratoid tumors as follows: (a) dermoids, containing tissue of epidermoid and mesodermal origin, (b) teratoids, containing tissue from three primary germ layers but poorly differentiated, (c) true teratomas, similar to teratoid tumors but differentiated into tissues resembling organs histologically, (d) epignathi, trigermal in origin and differentiated grossly into organs.4

This is a report of an unusual teratoma of the tongue which arose from the area of the foramen cecum at the base of the tongue. This was followed by a recurrent tumor in the substance of the tongue and the floor of the mouth. The foramen cecum represents the dimple where initially the thyroglossal duct attached. If the duct is not completely resorbed this may also be the site of lingual thyroid. However, in the below described tumor, there was no evidence of thyroid tissue in either specimen.

Report of Case

A 20-year-old gravida 2 para 1, was admitted to the hospital on 12/16/65. Ex-

Dr. Grier is head of the Department of Obsetrics and Gynecology at Illinois Masonic Hospital, Chicago, where Dr. MacNerland is a resident.

pected date of confinement was 12/12/65. Her contractions had started at 2:45 a.m. The labor was progressive and resulted in the spontaneous delivery of a viable male, 8 pounds and 15 ounces, at 9:25 a.m. Immediately there was noted a 6.5 x 4.5 x 2 cm, smooth, irregularly greyish, purplish mass arising by a narrow pedicle from the base of the tongue. Because of the narrow, highly vascularized pedicle, the stem was ligated and divided, delivering the mass. (Fig. 1.). After excising the mass, it was noted there was a complete cleft palate.



Fig. 1. Gross specimen: the original tumor removed from the base of the tongue.

The remainder of the physical examination was negative. The mother's previous and only other pregnancy had progressed and terminated in an entirely normal fashion with the delivery of an 8 pound, 5 ounce male in good health with no obvious defects. The mother's prenatal history was negative for any illness. Histologically, the tumor was composed of true skin and skin appendages, with occasional simple and epidermal inclusion cysts, proliferating nerve trunks and nervous elements, (Figs. 2,3,4,), many blood vessels, fibrous tissues, cartilage and true bone with bone marrow. None of the elements showed any atypical changes.

Five months later, 5/11/66, the infant was admitted to the hospital, with a mass



Fig. 2. Keritanized squamous epithelium from original tumor (100x).

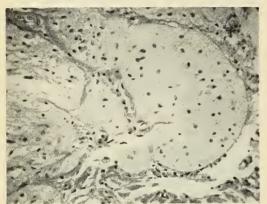


Fig. 4. Brainlike tissue from original tumor. (250x).



Fig. 5. The recurrent tumor at the floor of the mouth and left side of tongue.

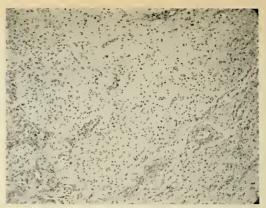


Fig. 3. Nervous elements resembling brain tissue from original tumor (100x).

under his tongue. This was first noted three days prior to admission when the child seemed unable to close his mouth. (Fig. 5). Physical examination revealed the tongue deviated to the right. The cleft palate was again noted. A smooth 21/2 cm mass was described under the tongue. An x-ray of the mandible on 5/12/66 revealed a congenital malformation of the anterior tip. On 5/19/66 the mass was excised from the left side of the floor of the mouth and the tongue. Histologically, this tumor had cystic cavities lined by epithelium of a respiratory type (Fig. 6), groups of acini and islets of Langerhans (Fig. 7), and a small portion of residual stratified squamous epithelial lining of some cystic cavities. On 8/19/66 there was no evidence of recurrent tumor. There was some evidence of atrophy of the left side of the tongue. The patient was discharged.

Comment

Benign involvements of the tongue may consist of cysts, namely of two types: the retention (most common), and the congenital, usually found at the base of the tongue. Retention cysts are rarely a problem, and are removed only when too large and persistant. Congenital cysts of the tongue are usually situated in the midline at or near the foramen cecum and may be akin to the cyst of the thyroglossal duct. Lingual thyroid is also located at the base of the tongue and may be tumorous, causing dysphagia, dysphonia and dyspnea as such.5 Miller and Owens report what to their knowledge is the first reported case of teratoma of the tongue. It extended by a stalk from the right lateral tongue and was a mass 7 x 3.5 x 3 cm. The tumor was removed in 1959 and checkup at 5 years revealed no recurrence.6 Quinn reports a

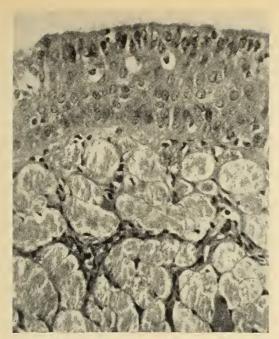


Fig. 6. Respiratory like epithelium of recurrent tumor. (250x).

congenital epidermoid cyst of the anterior half of the tongue and reports a review of the literature revealed only three cases of cysts in this location, one of which was composed of squamous epithelium, columnar epithelium, glands and smooth muscle.7 The tongue consists of two parts in derivation, an anterior or body, and a second paryngeal portion. (the base or root). The dividing point is usually considered the



Fig. 7. Pancreatic like tissue from recurre tumor. (250x).

terminal sulcus and foramen cecum. Sollee and Crook each report recent cases of nasopharyngeal teratomata with palatal defects and the tumor projecting from the mouth.^{8,9} In our case, the palatal defect was present but the tumor projected on a small narrow stalk into and out of the oral cavity. Rise reports a case of sublingual dermoid cyst of the tongue in a 13 year male noting it has been sparsely reported in the literature.10

Summary

A case of benign teratoma of the tongue is reported. Although teratomata are reported frequently throughout the body (with the exception of the extremities), the tongue itself seems to represent a rare location.

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The Varied Attitudes of Anti-Obesity Therapy

By Frank L. Bigsby, M.D. and Cayetano Muniz, M.D. / Chicago

Rodale's weekly health bulletin of Jan. 21, 1967, published a short discussion containing opposing views about the treatment of obese patients. A west coast physician estimated that he helps 1,500 patients shed 7,500 pounds every week as a weight specialist. Although similar successes are reported by the nearly 5,000 doctors who concentrate on overweight, the bulletin stated, the specialty is under fire from medical groups, physicians and even some patients. "We don't need tonsil specialists, why fat specialists?" one physician charged.

Both viewpoints mentioned in the bulletin reveal an alarming lack of knowledge and ignore the fact that the only method available to permanently alter the disturbed nutritional habits of obesity is through patient re-education and resultant improved insight. Today, the physician is the only individual prepared to provide the integrated program and individualized management required by the obese patient to control his overweight.

Medical Guidance Important

Arthur S. Fleming, Secretary of Health, Education and Welfare in the Eisenhower administration, stated "Medical guidance can be important to almost everyone who needs to lose weight. This may be true, even for persons needing to lose only a few pounds. The possibility of undetected chronic disease, or the continuing need for health and guidance, indicates the wisdom of consulting a physician. The individual who wishes to lose a large amount of weight has a serious medical problem, and without exception needs expert guidance."

Who is to educate the physicians compelled to make the inerudite statements in Rodale's health bulletin? The obesity specialist is giving the patient what he came in for, weight loss; without doubt, forced weight loss cannot be accomplished without danger in many instances. The foolish comparison of the weight specialist and tonsil specialist is equally alarming; to compare the highly frustrating treatment of obesity with the definitive therapy of tonsilitis should not be dignified by further comment.

Medicine's Official Attitude

What is the "official" attitude of the medical community regarding obesity and its treatment? Apparently it is based on "push yourself away from the table" and suggesting an increase in energy expenditure. True! All-encompassing! Excellent for cooperative patients! How about the 20 million remaining obese people? It is obvious that this attitude contributes nothing to improve the patient's insight or motivation. There is no doubt that most of these unfortunate people are super-saturated with having calorie charts thrust at them by uninformed, disinterested physicians having insufficient time to devote to the problem. It is possible that this attitude is contributing to the increase in popularity of the obesity specialist.

The health bulletin further states that American Medical Association investigator Oliver Field charges that the danger is that some patients are being needlessly drugged with a possible danger to their health, and it bothers us considerably. Us? One suspects that there is a group of consultants formulating "official" medical policy about the treatment of obesity. Are these consultants internists, surgeons, or specialists in other fields? Are they university affiliated physicians engaged in highly important research with hospitalized patients? From a clinical standpoint, even the most difficult obese patients lost weight temporarily while hospitalized. Are the consultants aware of, and do they truly represent, the problems of the tens of thousands of American physicians whose total knowledge and interest is limited to the archaic belief that obesity is either exogenous or endogenous? The great body of these physicians are advising their patients to push away from the table, or offhandedly presenting a caloric chart accompanied by hastily scribbled prescriptions for diuretics and anorexiants; perhaps an occasional injection of a mercurial is added. In truth, these physicians *must* believe the treatment of obesity is as uncomplicated as that of tonsilitis!

Problems of Obesity Complex

Criticism is foolhardy unless constructive in nature. The intelligent management of obese patients involves the admission that permanent improvement of faulty nutritional patterns may be one of the most difficult tasks in medical practice. There is little doubt that there will be a cure for cancer discovered before the complex problems of the obese are solved. It is possible that many physicians are guilty of a vast error in that they attempt to treat overweight rather than people; witness hospitalization and total fasts, gonadotropin injections + 500 calorie diets, over-dosage with potent drugs, unrealistically restricted diets, and the senseless use of diuretics.

In most instances the physician will sense that insight, rapport, and motivation are the three areas requiring attention if the obese patient is to permanently learn to say "no" when tempted with calories. The objective of treatment is to strive for the moment when rapport and motivation are high and that excellent insight into his or her problem has been established. This moment of apparent illumination may be realized during the initial interview in cooperative patients. In others, it may not be evident for many months, or it may come about after repeated failures to maintain weight-loss. For many patients, unfortunately, it may never arrive. The important point to remember is that all three factors must be evident and that absence, or serious deficiency, of any one factor paralyzes success. When motivation, rapport and insight are present, the physician should immediately outline his long-term plan of therapy. The plan involves the need for slow loss in weight, this to be followed by a period of observation for many months (or years), until the total calorie intake is limited to permanent weight maintenance levels.

Surface Psychotherapy

There is one logical method of approach to the problems of the obese that merits universal acceptance. It is so well defined that every physician should become acquainted with its use. Superficial or surface psychotherapy is the method of choice. Surface psychotherapy in the clinical management of obese patients includes four sub-divisions:

- 1. Aeration and ventilation
- 2. Explanatory therapy
- 3. Manipulative therapy
- 4. Supportive therapy

Last in importance, and running a poor fourth, in surface psychotherapy is supportive therapy . . . any objective help the physician may afford. Our position in a reducing regimen today in this respect is similar to the treatment of lobar pneumonia prior to the advent of antibiotics and sulfa drugs. The treatment of pneumonia was supportive in character (bed rest, oxygen, fluids, sedation, nursing care, etc.). The ethical and informed physician will stress this fact but will not be satisfied to give out this information and then abandon his obese patient. Even the most naive should realize that the difficult obese patient cannot be expected to go home and behave calorically upon receiving a pep talk relative to energy intake and expenditure. Neither will the physician be so foolish as to put more credence in supportive care than it deserves, as we have seen is the case in certain other instances.

Supportive Role of Drugs

The physician employing surface psychotherapy in the treatment of obesity not only has the right, but is obligated, to use every ethical method at his disposal to keep the patient from prematurely breaking off treatment before the long-term program of psychotherapy designed to improve insight, motivation, and rapport can become a fact through constant reinforcement. The intelligent supportive use of metabolic stimulants, anorexiants, diuretics (in demonstrable edema only), sedatives, anti-cholinergics, and placebos is perfectly valid. The physician should assume absolute control of certain of these agents in order to force the patient to make regular office visits;

(Continued on page 99)

Serendipity(?)

By William G. Parker, M.D./Mount Vernon

In the year 1924, the sulfonamides had not been developed; penicillin did not exist except on stale bread, and antibiotics were unheard of. I would not say undreamed of for Ehrlich had conceived the idea of a grand sterilizing agent and had produced the arsphenamines. These were highly effective against the Treponema pallidum and the Plasmodium falciparum malaria parasite.

The following clinical report of a case treated 42 years ago in which the result could not have been better had the modern products been available at that time.

The patient was a 12-year-old husky boy who was seen in my office on a Tuesday morning. He had an acute tonsillitis and an acute mastoiditis, which was common in those days. The parents refused surgery on the mastoid and took the boy back to the farm home.

On Thursday he was brought back. The neck was badly swollen on the side of the mastoditis and he appeared very sick. The mastoid was operated upon the same day and the usual drainage was instituted. His condition improved and on Monday morning his temperature was normal. That afternoon the temperature rose rapidly to 105.6 F and stayed there.

For the remainder of the week he had high fever. Ice packs brought the temperature to 104 F, but no lower. The mastoid was reopened and the wound had the appearance of a normal postoperative condition. There was no thrombosis in the jugular. Blood cultures were not available in the small hospital at that time and there was no bacteriologist in the community. At the primary operation, it was noted that the mastoid had perforated into the digastric fossa permitting infection to spread into the neck. My impression was that a staphylococcic blood stream infection had occurred, possibly by way of the emissary

(Continued on page 80)



Dr. Darrell Trumpe (left), Fifth District Trustee, presenting Fifty-Year Club certificate to Dr. Charles McLaughlin, Chatham, at recent meeting of the Sangamon County Medical Society. Dr. Walter Martini, Springfield, received his membership pin and certificate at the same meeting.

USPH Grants to 170 Schools

Grants totalling \$30,000,000 to 170 schools and colleges in 44 states and the District of Columbia were announced May 27 by Leonard D. Fenninger, M.D., Director of the Bureau of Health Manpower, Public Health Service.

Ranging in size from \$23,890 to \$424,756, the grants are for the purpose of improving the quality of medical, dental, optometric, and podiatric education. Largest single grant was to the University of Indiana School of Medicine.

The grants are titled basic improvement grants and their amount is determined by statutory formula. They were recommended for approval by the National Advisory Council on Medical, Dental, Optometric, and Podiatric Education and approved by Surgeon General William H. Stewart, M.D.

Allowable grant expenditures include salaries of professional and supportive staff, associated fringe benefits, purchase of supplies and equipment, and allowable costs of minor alterations and renovations.

The grants may not be used for the operation of teaching hospitals, patient care, financial assistance to students, research, research training, or capital construction.

Obstetric Hemorrhage

By THOMAS R. WILSON, M.D./URBANA

This old subject has not gone out of existence with all the medical advances. The incidence of death from hemorrhage has steadily decreased, but the incidence of hemorrhage is little changed.

Any vaginal bleeding in the last trimester is considered abnormal, except the so-called "bloody show" which indicates that labor is imminent. The term hemorrhage is rigidly defined as being a loss of 500 cc. or more in the intrapartal and postpartal periods. Any amount of vaginal bleeding during the last three months should be classified as potential hemorrhage until proven otherwise. About one patient in 25 will have some detectable third trimester bleeding. All of these obviously do not progress to definitive hemorrhage or even to definitive diagnosis.

The causes of bleeding in the last trimester are, in order of frequency:

- 1. Marginal sinus rupture (partial separation of edge of placenta).
- 2. Low lying placenta (placenta praevia).
- 3. Premature separation of placenta (abruptio placenta).
- 4. Others—such as malignancy, cervicitis and endocervicitis, cervical polyps, vaginitis, etc.

From these remarks, it is apparent that about one patient in 25 will have bleeding in the last trimester, about 60 percent of this number will never have a diagnosis. Approximately 1.75 percent will proceed to bleed enough to be diagnosed as obstetrical hemorrhage (including intrapartum and postpartum). Hemorrhage is about three times as common from low lying placentae as from premature separation of the placenta.

Dr. Wilson, a member of The Department of Obstetrics and Gynecology, Carle Foundation Hospital, Urbana, presented this paper May 22, 1967, before The Illinois Obstetrical and Gynecological Society.

As indicated, it is not possible to avoid obstetrical hemorrhage. Some preventive measures are helpful, however. Each patient should reach the last trimester with as good a reserve of blood as possible. At the first prenatal visit, hopefully in the first trimester, a hemogram should be done. Probably all pregnant women should receive iron routinely. Certainly if the hemoglobin is below 12.5 gm. or the hematocrit below 40 percent, iron should be given. At 28 or 30 weeks, or before if the first blood evaluation was not satisfactory, a hemoglobin or hematocrit should be repeated. If the result is below 12.5 gm. of hemoglobin or a 40 percent hematocrit reading, the cause for the anemia should be found. The vast majority of these patients have an iron deficiency anemia. Additional iron must be given, either by mouth or by intramuscular injection. No patient should come to delivery date with a hemoglobin of less than 10.0 gms, or a hematocrit of less than 35 percent. Should this happen, these patients should be brought up to this level by transfusions or at the very least be typed and crossmatched with instantly available, adequate blood. The intramuscular and even intravenous iron dextran preparations have made these criteria readily attainable. An obstetrical patient should have as many blood transfusions as is necessary to assure her physician that she has a good reserve to withstand the blood loss she may have to suffer.

The staff at Carle Foundation Hospital practices these preventive measures. As a result the incidence of obstetric hemorrhage from 1962-1966 was 0.88 percent—or a total of 39 in 4,410 mothers delivered. Transfusions were required in 0.73 percent or in 32 patients. The low incidence, we believe, is due primarily to preventive measures.

Incidence

How common is hemorrhage today? According to the Illinois statistics for 1966

Table 1 Obstetric Hemorrhage Carle

Carle	State
Hosp.	of Ill.
(1962-66)	(1966)

Total patients delivered

delivered 4410

Obstetric

hemorrhage 39 (.88%) 1.71% Patients transfused 32 (.73%) 2.28% Afibrinogenemia 2 Major surgery required 0

compiled by the Illinois Department of Public Health, there were 3,371 cases in 197,156 deliveries for an incidence of 1.71 percent. This was the most common single complication of pregnancy in Illinois in 1966. The incidence of hemorrhage is about the same, regardless of the number of mothers delivered in a hospital. In 1966 in Illinois in 42 hospitals that delivered from 100 to 249 mothers per year, the incidence of hemorrhage was 1.57 percent; in 20 hospitals that had more than 2,000 births, the incidence was 1.55 percent.

Table 2

Incidence of Obstetrical Hemorrhage in Illinois 1966

42 Hospitals delivering from 1.57% 100-249 births

20 Hospitals delivering more than 1.55% 2000 births

Total of 235 Hospitals in State 1.71%

Hemorrhage continues to be the leading cause of maternal death throughout the United States. Even in instances where deaths are attributed to other causes, hemorrhage has often been a leading factor in the tragedy. Even with patient survival the complications associated with acute blood loss, may result in permanent damage to kidneys, and to the pituitary gland, rendering the patient a chronic invalid.

Management

The problem of what to do when confronted with a patient in the last trimester who is bleeding can be easily written down on paper, shown on a pretty colored slide, and spoken glibly and with great confidence. Unfortunately, these problems are not as easily categorized, diagnosed, treated and disposed of during the gory crises that inevitably arise in the dead of night. The principles of management are these:

Table 3

Management of Obstetrical Hemorrhage

- 1. Recognize that hemorrhage exists.
- 2. Diagnose the causes.
- 3. Treat the causes.
- 4. Replace the blood.
- 1. Recognize that hemorrhage exists. Get and keep a record of pads used, towels used, mattress pad soiled, clots passed. Pile all these things in the room so that they are ever in view and in mind. Remember that a clot represents about twice that volume in blood, that a soaked perineal pad will absorb 100 cc. of blood, that a 12-inch diameter mattress pad stain is 100 to 150 cc. of blood. Remember that a patient can lose 15-20 percent of circulating blood volume with little effect. As the figure approaches 30 percent (2,000 cc.) the pulse rate rises and the systolic pressure falls, faintness, pallor are evident. The skin gets moist and cold. Anxiety and air hunger are noted as the respiratory rate increases. As a 50 percent loss of volume is approached, the blood pressure cannot be obtained, mental confusion or non-responsiveness is present, the radial pulse is not perceptible-and it is too late.
- 2. Diagnose the underlying cause of the hemorrhage. There is only one direct way to make a diagnosis, and this is by vaginal examination. Blood replacement and diagnosis can be carried out simultaneously if necessary. Before proper treatment can be instituted, a diagnosis must be made. Experts now disagree on when to do a vaginal examination. Almost all experts do now agree that rectal examination should not be done. One noted expert stated in a recent article:

"One of the greatest errors made in the management of patients admitted with hemorrhagic complications is the early performance of a rectal or vaginal examination."

An equally noted expert, who is also head of the Department of Obstetrics and Gynecology at an equally famed medical school, states in a recent article:

"One must examine the patient in an effort to determine the source and significance of the increased blood loss." Prompt examination of the patient for the purpose of making a precise diagnosis is imperative. Bleeding of an unknown source and cause

should be promptly investigated lest it represent but the first signs of something sinister."

When justly recognized experts disagree, what can clinicians do? When experts disagree use your common sense. A vaginal examination, including careful palpation and inspection of the lower genital tract, should be performed. The attitude that vaginal bleeding during pregnancy and delivery can be hopefully ignored is based on fear.

The time of doing a vaginal examination will depend on how much blood has been lost, how profuse the bleeding is currently, the length of gestation period, whether or not the patient is in labor, the general status of the patient, the condition of the infant. It may be possible to defer examination, diagnosis and treatment for the moment, or until a more propitious time. However, the fact that a vaginal examination is done and a diagnosis made does not necessarily mean that treatment must immediately be instituted. The magnitude of the problem will determine when and where the examination should be done. Examinations in operating-delivery room with surgical assistants, anesthetists, laboratory technicians may be advisable, but frequently not possible.

3. Treat the condition as indicated. Today more and more the trend is toward abdominal delivery. Bags, bougies, scalp traction, internal version, etc. are now relegated to history and properly so. Either a prompt, relatively atraumatic vaginal delivery should be possible or a cesarean section should be done. When should delivery be accomplished? Delivery should be done at the time it seems safest and best for the fetus and mother. What kind of anesthesia should be used? The best available anesthesia in your hospital at the time of delivery, given by the best available anesthetist.

4. Replace the blood lost. For purpose of discussion—this is the last item. Blood replacement should go on from the moment it can be obtained—simultaneously with other procedures.

Postpartal hemorrhage is much easier to talk about and to treat because there is only the mother to consider. Postpartal hemorrhage may occur at any time from delivery to approximately one month from delivery. The etiology in order of frequency of occurence is:

- 1. Uterine atony
- 2. Bleeding from the placental site
- 3. Lacerations of genital tract
- 4. Retained secundines, endometritis
- 5. Uterine tumors and others

Immediate postpartal hemorrhage may be anticipated when the patient has had a premature separation of the placenta, or a low lying placenta. Other causes are polyhydraminios, multiple pregnancy, traumatic delivery, large infant, prolonged labor.

Hemorrhagic (Hypovolemic) Shock In The Obstetric Patient

The treatment in the undelivered mother with a viable infant should be concerned with adequate oxygenation and the maintaining of a systolic B.P. of at least 80 mm of Hg in order to effect adequate blood exchange in the villous spaces. Otherwise, the treatment is the same pre and postpartal. Regardless of the cause of the hemorrhagic or hypovolemic shock, the treatment is the same.

The therapy consists of the immediate replacement of blood loss with adequate amounts of compatible blood. The first step is to secure an adequate vein or veins by cut down if necessary. Time is of the essence-a delay of a few minutes may be fatal. Use a 15 gauge needle or catheter or at least an 18; 500 cc of blood can be administered with a pressure apparatus using a sphygmomanometer in less than 5 minutes through a 15 gauge needle—in 7-10 minutes through an 18 gauge needle. Use a double set up of intravenous bottles-pumping air into the bottle containing blood, which forces the blood into the second bottle containing 0.9 percent NaCl. The blood, being heavier, flows into the patient without mixing with the saline. Use about 120 mm. of Hg. pressure. A 3-way stopcock and a large syringe can be used. On plastic bottles the blood pressure cuff can be wrapped around the bottle. Gravity flow is not enough!

If blood is not immediately available—use Lactate Ringer's solution or up to 1,000 cc of dextran. If necessary, administer O negative or O positive uncrossmatched blood. Do not let a patient die or suffer irreparable damage while blood is being crossmatched.

Use simple supportive measures. Lower the head 10 degrees, elevate the legs, administer high concentrations of oxygen.

Coagulation Defects

Be alert for coagulation defects, especially with abruptio placenta, retained dead fetus, amniotic fluid embolism, or just from hemorrhage. Four mechanisms have been demonstrated by which hypo or incoagulability of the blood may develop:

- (1) Plasma fibrinogen may be reduced by two processes. Prolonged bleeding and clotting within the uterine cavity uses up large quantities of fibrinogen. Necrosis of tissues rich in thromboplastin, as in abruptio placenta, macerated dead fetus, and amniotic fluid infusion, leads to the entry of thromboplastic substances into the circulation resulting in the conversion of fibrinogen to fibrin, and the depletion of the fibrinogen stores.
- (2) Fibrogen and fibrin may be destroyed by plasma fibrinolysis, which are activated when kinases present in amniotic fluid or endometrium are released into the circulation.
- (3) Thrombin may be inactivated or the conversion of prothrombin to thrombin may be blocked by a heparin-like substance contained in amniotic fluid.
- (4) The amount of platelets and/or of the accelerator factor may be decreased.

Evaluation of a patient with clotting defect can be readily performed at the bedside and requires no special material. A 5 ml. sample of blood is placed in a dry 15 ml. test tube and gently agitated 4-5 times and observed for clotting. Coagulation is defective if there is no clot within six minutes, or if the clot formed is not solid and lyses within 1 hour. The presence of circulating fibrinolysins is demonstrated by mixing equal parts of unclotted maternal blood and normal clotted control blood-lysis of the normal clot constitutes a positive result.

A circulatory heparin-like factor is diagnosed by placing equal parts of maternal blood and normal control blood in a test tube; failure of the combined specimen to clot indicates pressure of the heparin-like factor. Since the clotting defect in pregnancy is a dynamic process, clot observation should be repeated every 30 minutes until delivery and for 3-4 hours postpartum.

Table 5

Treatment of Coagulation Defects (specific)

Fibrinogen lack—4 grams of fibrinogen.
 Fibrinogen destruction by fibrinolysin-

- fibrinogen plus epsilon amino caproic acid (Amicar).
- 3. Thrombin inactivation by a heparin-like substance—by protamine sulfate.
- 4. Decreased platelets and/or the accelerator factor—epsilon amino caproic acid (Amicar).

Treat clotting defects according to the nature of the defect-almost all are due to a fibringen defect. In a patient with little or no fibrinogen (no clot in six minutes), a minimum of 4 gms, of fibrinogen dissolved in 400 cc of distilled water is infused as rapidly as possible. This should be enough to raise the fibringen level to 100 mg. percent from 0 mg. percent (the critical level is 150 mg. percent). If no improvement in 30-40 minutes-an additional 4 gm. should be given. If this does not cause coagulability there is another factor present-probably the fibrinolysin factor. Then the patient should receive epsilon aminocaproic acid (Amicar); an initial priming dose of 4-5 gm. dissolved in 200 cc. of saline. This should be given at the rate of 1 gm. per hour afterwards until bleeding is controlled. If a heparin-like factor is present, intravenous protamine sulfate should be given by slow intravenous injection (3) mm.) in doses of 5-8 mg. per kilogram of baby weight.

Vasopressors should be mentioned, though they have lost favor. The pressor amines may restore, momentarily, blood pressure. Levophed 2-4 mg./1,000 cc. and aramine 500 mg./1,000 cc. are used. In acute hemorrhagic shock, these are of limited value. Adrenocorticosteroids may be used in moderate or severe shock. Hydrocortisone (100-250 mg. of Solu-Cortef) may help. The dose may be repeated in one to four hours as necessary.

Citrate toxicity may be avoided by administering 10 ml. of 10 percent calcium gluconate for every three-four pints of blood.

Use blood as fresh as possible, though as far as fibrinogen level is concerned, there is little difference in blood one day or 21 days old.

Blood transfusion and fibrinogen administration are not without hazard. The chief hazard, is that of infectious hepatitis. The incidence of hepatitis from blood transfusion is estimated as being 0.5 percent per unit of blood. The incidence from fibrinogen administration is from 3-5 per-

cent. The alternative of death, however, makes these risks reasonable.

If oliguria (less than 20 ml/hr) develops, and if the oliguric patient has received adequate blood and fluid, a diagnostic trial of mannitol may be used to differentiate socalled pre-renal failure from acute tubular necrosis. The usual procedure is to give 12.5 gm. of mannitol (in 50 ml. of a 25 percent solution) over three-five minutes. The urinary output should be measured accurately. If the flow increases to 40 ml, in any one of the next three one-hour periods the patient probably does not have acute tubular necrosis and the oliguria should respond to fluid therapy. With a favorable response 100 gm. of mannitol (in 1,000 cc of 10 percent solution) may be infused safely over the next 24 hours along with appropriate water and electrolyte replacement to prevent depletion. If urinary output is adequate after this period, mannitol may be discontinued. If by the above mentioned three hours urinary volume has not reached 40 ml/hr (and hydration is adequate), give 25 gm. of mannitol (in 100 ml. of a 25 percent solution) over six-minutes. again the urinary output does not increase to 40 ml. in any one of the next three hours, the treatment for acute tubular necrosis should be instituted.

If shock has been so severe that acute tu-

bular necrosis is feared, mannitol may be given before oliguria develops, using 25-50 gm. in 500 ml. of isotonic saline regulating the drip rate to conform to a urinary output of 30-40 ml/hour. Perhaps this is helpful in preventing acute tubular necrosis.

Summary

The majority of hemorrhagic deaths are preventable. Why then do they continue—and why is hemorrhage the leading cause of death? Probably the reasons are these:

(1) Delay in initiating therapy (2) Ineffectual methods of transfusion (3) Optimistic estimates of blood loss (4) Failure to recognize coagulation defects (5) Watchful waiting and hopeful expectancy.

Obstetric hemorrhage is still the leading cause of maternal death in the United States. Good prenatal care is good preventive insurance. The principles of treatment are (1) early recognition (2) prompt diagnosis (3) adequate treatment and (4) administration of adequate blood (5) specific therapy where indicated for coagulation defects. Recent advances in treatment have been the recognition of coagulation defects with specific treatments for each. The use of hydrocortisone and now perhaps of mannitol may add to our armentarium.

Audio-Digest Issues New Catalog Of Tape Recordings

A library of more than 300 one-hour tape recordings, devoted to comprehensive panel discussions and symposia on everyday office problems, has just been released to the medical profession by the Audio-Digest Foundation, Los Angeles, Cal.

According to the foundation's medical board, the 1967 "Catalog of Classics" makes available to individual physicians, hospitals, and clinics, ideal Journal Club and teaching material in seven specialty areas: anesthesiology, obstetrics-gynecology, surgery, pediatrics, internal medicine, ophthalmology, and general practice. A number of tapes also focus on the basic sciences, cancer, psychiatry, gastroenterology, cardiology, arthritis, geriatrics, and hematology.

The recordings represent distillates of onthe-spot recordings from several hundred major meetings of such groups as the American Medical Association, American College of Physicians, American Society of Anesthesiologists, American College of Obstetricians and Gynecologists, as well as condensations of major university postgraduate courses.

According to the medical board, the selected recordings represent the latest and most authoritative reviews of modern-day diagnosis and treatment, in the actual voices of America's finest teachers and clinicians. This special library of titles represented the best of programs produced in the regular subscription programs of the Audio-Digest Foundation (a nonprofit subsidiary of the California Medical Association) during the past several years.

The Catalog of Classics is available free of charge and may be obtained by writing the Audio-Digest Foundation at 619 S. Westlake Ave., Los Angeles 90057.



THE VIEW BOX

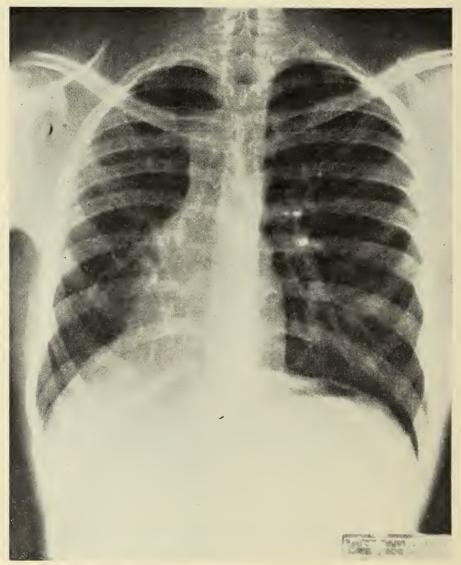


Fig. 1

This 25 year-old N/M was seen because of a reported abnormality on a routine chest film. The only significant history related to three bouts of pneumonia. Physical findings were unremarkable—no murmurs were heard. The BP was 120/78. Laboratory findings were within normal limits.

What's your diagnosis?

- 1) Atelectasis of the right middle lobe.
- 2) Bronchiectasis of the right middle lobe and right lower lobe.
- 3) Mucoviscidosis.
- 4) Anomalous venous drainage and hypoplasia of the right lung.

(Answer on pages 104-105)



Healing the Sick Mind. Dr. Harry Guntrip. Appleton-Century, New York, 1965. Clothbound. 226 pages. \$4.95.

To know the purpose of this book and the reason for its publication, one must first learn something about the author, who was originally a minister who used his knowledge of psychology to treat people in England who broke under the strain of World War II. In fact, Dr. Guntrip was invited by Dr. Henry B. Dix Nuffield, Professor of Psychiatry and Chairman of the Department of Psychiatry at Leeds University, to become a research psychotherapist in his department so that he could utilize his knowledge as a fulltime psychotherapist who even had individual psychoanalytic training. Accordingly, Dr. Guntrip resigned his ministry and went into fulltime psychotherapy.

From this background then, and from Dr. Guntrip's interest in human beings with their personal problems, came forth this volume. There are three major areas, Part I "The Classic Diagnosis of Mental Ill Health" introducing the reader to a splendid discussion with a carefully written description of classical symptoms of mental illness including those strains which cause them. In Part II entitled "Deeper Understanding" Dr. Guntrip discusses the depths and the secrets of the human personality and again the disturbances to which these are prone. He continues to emphasize that which is the basic conflict in all personalities. In Part III "Treatment" the author discusses the different types of treatment, gives an excellent general survey with a critique on the various types of management and the problems which he hopes he can solve.

Actually the purpose of this book is almost a "do-it-yourself" message. In the "Healing of the Sick Mind" it is intended

that the reader try to help himself and others to live the kind of life that will enable him to realize his strengths and his weaknesses that are such common denominators amongst many such other people. There is no question that many readers who know the author as a psychotherapist through his radio talks on Mental Health would be those who would benefit so greatly by reading in print much about the "secrets" of the human personality.

Louis D. Boshes, M.D.

DISORDERS OF THE RESPIRATORY TRACT IN CHILDREN BY 29 AUTHORITIES Edited by: Edwin L. Kendig, Jr., M.D., 834 pages, with many illustrations, Philadelphia, London: W. B. Saunders Company, 1967. \$26.00

Respiratory disorders constitute one of the major problems of pediatric practice. Furthermore, unlike in the adult, the clinical patterns of most respiratory disorders are influenced by the child's growth and development. Over the last 25 years striking developments in the diagnosis and treatment of respiratory disorders have occurred. Heretofore, standard pediatric textbooks have only briefly dealt with these problems. Dr. Kendig, a distinguished clinician, who has devoted his life to the study of chest diseases in infants and children has produced a superior textbook that not only reflects the rapid growth of our knowledge in respiratory diseases, but also fills a long existing void in this area of pediatrics. Together with his 29 associates, men also eminent in their special fields of interest, the editor has produced an up-to-date volume comprising a full and useful compilation of current knowledge in the field of respiratory disorders. The tempo of the book is set in the very first section where Victor Chernick and Mary Ellen Avery present an

excellent, concise summary of the major concepts of respiratory physiology.

Of special interest are sections on asthma by Susan Dees, cystic fibrosis by Harry Schwachman, a world authority in this area, and a discussion of primary and secondary pulmonary hemosiderosis by Douglas Heiner. This latter entity is gaining more recognition in pediatric circles especially in its association with sensitivity to cow's milk. In the chapter on tuberculosis, Kendig draws heavily on his own clinical experience. Excellent photographs depicting the application of the various skin tests for tuberculosis and their positive reactions are of extreme value to the unindoctrinated. The presentations of all the contributors to this timely volume are of the highest quality. In any book with twenty-nine contributors one can always find minor points over which to quibblefor picayune example, chapters on such obsure entities as pulmonary alveolar proteinosis and thesaurosis secondary to hair spray, conditions not as yet described in children, are discussed whereas no mention is made of pulmonary dysfunction, a syndrome first reported in premature infants by Mikity and Wilson in 1960.

Despite the fragmentation into many subdivisions and multiple authorship, the book is well organized and the editor has evolved a text that admirably encompasses the field of respiratory diseases in infants and children. The book is well written, and the presentation of data is succinct. Abundant illustrations complement the text, and in particular, the radiographic reproductions are of high quality.

The bibliography is extensive and current. The use of bold-face type to identify the sections is extremely helpful for a rapid survey of individual chapters.

In sum this text will be read and enjoyed by the clinician be he general practitioner, chest physician, roentgenologist, inhalation therapist or pediatrician, as well as by residents, interns and medical students.

Oscar A. Novick, M.D.

DIBS-IN SEARCH OF SELF. Virginia M. Axline, M.D. Houghton-Mifflin Company, Boston, 1965, Clothbound, 186 pages. \$3.75.

Dibs-In Search of Self is a unique little volume about a child named "Dibs" and is based on actual recordings of weekly discussions and sessions between this mute and withdrawn child and his therapist, the author, who has developed a specific and special type of psychotherapy in handling her patient. Dibs, in effect, is another child Helen Keller who is depleted because of his emotional symptoms and has retreated so severely that no one is able to reach him. He has had numerous studies, not only by physicians but also by other authorities within the school system. Yet, no specific diagnosis is plausible or even possible. Dibs has withdrawn into a shell unable to be cracked by anyone and he remains physically and emotionally inaccessable. Dr. Axline accepts the challenge and begins what she calls her "play therapy." The therapist permits her patient to find his own strength, to make his own speed in this slow tortuous trip, to learn the depths of initial conflicts and to be able to help restore that strength which he has never been able to utilize. Finally, Dibs masters his intense emotional communication with his therapist.

No one reading this book, whether he be a lay person or a scientist, can fail but have the greatest love and admiration for the little boy and for the courage he displays. The author is to be congratulated for her masterful emotional communication which parallels her personal triumph.

Louis D. Boshes, M.D.

THE MASK OF SANITY. Hervey Cleckley, M.D. C. V. Mosby Company, St. Louis, Mo. 4th Edition. Clothbound, 510 pages. Extensive bibliography. 1965, \$9.75.

This remarkable book first appeared in 1941, later in 1955, and is presently in its fourth edition. Its value and significance seems to increase through the years as it continues to remain a standard in the field of psychiatry. In the first edition, the author painted the picture of the psychopath as he was studied under closed door conditions, whereas in the second edition he broadened the picture by thorough changing of the book to which he added a modified description and evaluation. In the third edition it was quite apparent that Dr. Cleckley would have to again modify the concept of the psychopath which he had laid down. As such, he had to revise the official nomenclature of the psychiatric illness to such a degree that

he replaced the term psychopathic personality to sociopathic personality, and as he states, he continued to "learn more" about the sociopath, the so-called psychopathic personality. It took him some 23 years to do so.

The fourth edition had to appear, and in this book, Dr. Cleckley portrays 13 splendid detailed case histories on the sociopath in his every day existence both at home, at work, and other settings. He clearly portrays the reactions of the sociopath, as Dr. Cleckley states, "a human being." The very latest thoughts on etiology or other causal factors in the development of this psychopath personality are presented. Dr. Cleckley pulls no punches whatsoever when he emphasizes seriously disordered this individual is and the difficulties, which exist in his control, either from the point of view of the patient or even from the doctor who is managing him. The author makes no bones whatsoever in warning the psychiatrist of what lies ahead in the management of such an individual on a day by day basis.

This is a book that should be standard equipment in the library of every psychiatrist or for anyone who deals with human behavior.

Louis D. Boshes, M.D.

LABOR: CLINICAL EVALUATION AND MANAGEMENT, by Emanuel A. Friedman, M.D., Appleton-Century-Crafts, New York, 1967. 397 pages, \$13.50

This excellent monograph on labor is a comprehensive work based on the author's experience and numerous publications on the study of normal and abnormal labor through the pattern of cervical dilatation. It is based on 19,150 multiparous labors and 9,600 primiparous labors. The differentiation of the types of ineffectual labor and their treatment are covered in this lucid and well-written text. Graphs plotting the relationship between cervical dilatation and the time in labor are clearly drawn and clearly explained. The significant aspects of normal and abnormal labor are delineated and coordinated well with the therapy recommended.

The book is divided into five parts. Part I deals with normal labor and its physiology. Part II covers abnormal labor, its definition, etiology, treatment, and prog-

nosis. Part III is about endogenous factors such as age, parity, gravidity, fetal position, leiomyomata, and others. Part IV deals with the exogenous factors such as anesthesia, analgesis, sedation, and other drugs. Part V lays out a practical program for the management of aberrant labor, its detection, diagnosis, evaluation, and treatment.

This is a well-written, easily understood book with good graphs, tables, and discussion. References are present at the end of each chapter for those who wish to delve into the material in more detail. It is essentially a clinical book and certainly deserves the attention of all obstetricians, whether in the resident, practicing physician, or investigator ranks.

Paul D. Urnes, M.D.

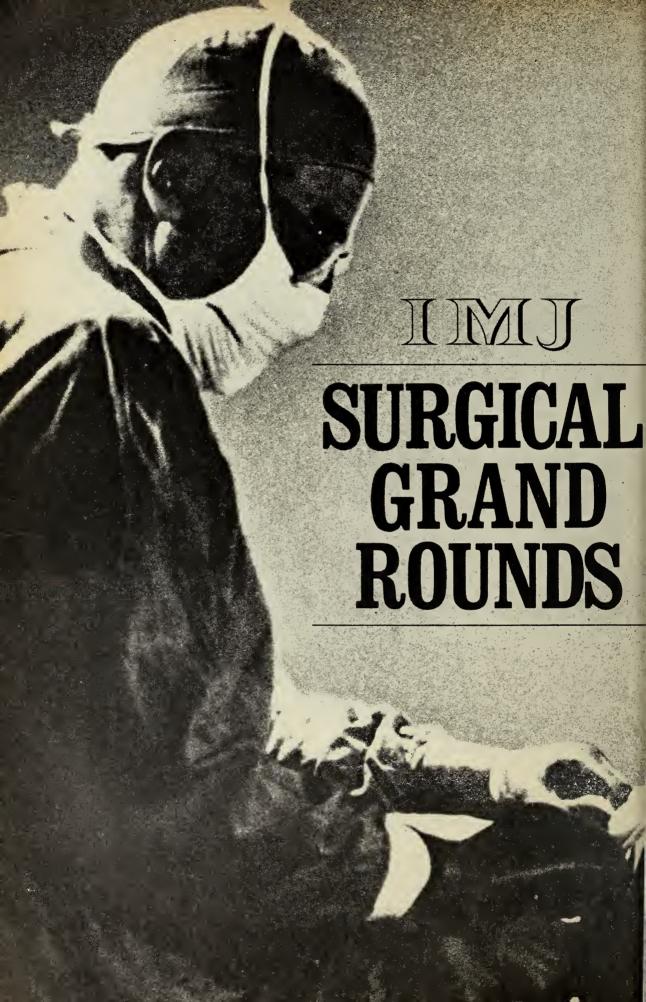
APPRAISAL OF CURRENT CONCEPTS IN AN-ESTHESIOLOGY, Edited and Assembled by John Adriani, M.D., Volume 3, The C. V. Mosby Co., St. Louis, Mo.

This series represents the joint efforts of the members of the anesthesia department of Charity Hospital of Louisiana to review subjects in the current scientific literature which are of particular interest to the anesthesiologist. In most of the reviews, the intent is to summarize the "old" and to add the "new". No claim is made that these are exhaustive reviews of the chosen subjects, and in nearly every case, they are not.

The current volume consists of 50 chapters. The first dozen or so relate to the respiratory system; another group of eight discuss the cardiovascular system and the bulk of the remaining 30 chapters deal with subjects of general interest in anesthesia. The final two chapters, one on writing examination questions and the other discussing subjects to be taught to residents, depart from the stated purpose of the volume but do not diminish its value.

Every chapter has been prepared by a staff member or a trainee in the editor's department. Breadth of knowledge and authority of approach vary widely with such an arrangement and unfortunately this is all too obvious throughout the text. It would have been helpful if the author and his qualifications had been given at the beginning of each chapter. The anesthetic neophyte using the text would then know how much reliance to place on the material

(Continued on page 84)



Case Presentation

A-V Fistula

EDITED BY JOHN M. BEAL, M.D.

Northwestern University Medical Center

Surgical Grand Rounds are held weekly at 8 a.m.; alternating between the staff room, Chicago Wesley Memorial Hospital, and Offield Auditorium, Passavant Memorial Hospital. Patient presentations from these hospitals and from the Veterans Administration Research Hospital form the basis of the discussions. This case report was part of Surgical Grand Rounds held at Passavant Memorial Hospital on February 11, 1967.

Dr. Louis Bonucci: This patient, a 46year-old white male, suffered an injury to the right thigh from a shell fragment while on active duty in World War II. He was removed to a rear area hospital and experienced considerable bleeding from his wound. Following treatment at the hospital, the wound healed well and he returned to normal activity in civilian life, after the war. Approximately 10 years ago he noticed a soft, non painful bulge in the left groin area. Subsequently this slowly enlarged in size and became obviously pulsatile. Physical examination showed his blood pressure to be 130/70; pulse, 84. A grade 2/4 systolic murmer of the heart was found. There was a huge pulsatile mass in the upper thigh. This exhibited an audible bruit and a palpable thrill. Compression of the mass produced a marked increase in the patient's diastolic blood pressure and a decrease in his pulse rate. The latter was documented on electrocardiographic tracings. Laboratory determinations included a normal blood count and urinalysis. He was found to have an increased blood volume. The x-ray studies included an angiogram.

Dr. Hirsch Handmaker: An arteriogram was performed with an intra-arterial catheter placed in the aorta. The early phase demonstrated a dilated left iliac artery, which communicated with the iliac vein through



Fig. 1. The arteriogram shows the fistula between the femoral artery and vein in the region of the shell fragment.



Fig. 2. A later film in the sequence from the arteriography shows a tremendously dilated femoral-iliac vein with a venous impression on the bladder wall.

for Iu/v, 1967

a fistula located in the area of a metal fragment (Fig. 1). Another film taken shortly thereafter showed prompt return of the contrast material through the venous system. There is an impression of the lateral bladder wall on the pyelogram which proved to be extrinsic, the deformity being produced by the markedly dilated veins of the lateral pelvic wall (Fig. 2). Chest films show the heart is enlarged approximately 15 percent above normal, without evidence of pulmonary congestion.

Patient Enters And Is Examined By Dr. Beal

Dr. John Beal: The pulsatile lesion is clearly visible and there is a definite thrill which is easily palpable. One can also see some varicosities on the left leg.

Dr. John Bergan: The wound of entrance is on the left upper posterior thigh although on the x-rays the metallic fragment is quite far anterior. The Bradham sign has been alluded to by Dr. Bonucci and it is also referred to as the bradycardiac reflex. When the parasitic circulation is occluded by closing the fistula, the pulse rate slows and the diastolic blood pressure rises. (During demonstration of closing of fistula, the pulse rate drops from 84 to 64.)

Patient Leaves

Dr. Bergan: Hemodynamically important arteriovenous fistulas are mainly traumatic in origin. Interestingly, the injury may be produced by the physician at times. Galen was the first to record this when he described a consultation in which he was called by a young physician to attend a patient. The young physician had introduced a lancet into the antecubital area during therapeutic blood letting and was greeted by a gush of blood, as Galen said, "from the pulsating vessel." Galen called the young man outside the room, a nice professional touch, and told him that he had opened the wrong vessel. Galen later said that this was the only arterial wound which he treated which did not form either an arteriovenous fistula or an aneurysm.

William Hunter is credited with the first description of an arteriovenous fistula. In 1757 he described the "purring" sound of the bruit as being the sound made by the letter "r" when trilled softly by the tongue.

In 1910 Matas gave his presidential ad-

dress to the American Surgical Association on the collateral circulation of arteriovenous fistula.⁴ At that time he said that the surgery of arteriovenous fistulas was "uncertain or heroic." It certainly must have been all of that and more in those days before blood transfusion.

In the 1920's, Dr. Emile Holman's studies defined the pathological physiology. Later through the late 1940's, the treatment of arteriovenous fistulas was still quadruple ligation and excision of the artery, vein, and the attacked fistula. Even as late as 1962 the latest edition of Allen, Baker and Hines' textbook of vascular disease still said that a waiting period should transpire between the arteriovenous injury and the time of surgery so that collateral circulation might develop. Despite this, modern treatment consists of arterial and venous repair in nearly all instances.

A-V fistulas are usually located in the extremities with the popliteal artery more frequently involved than the femoral. Brachial and common carotid arteries are next in order of frequency. Since the arterial pressure in the human body is a resultant of the magnitude of the cardiac output and total systemic resistance, a low resistance shunt like this with a large communication between artery and vein, requires that the total cardiac output be increased in order to maintain normal blood pressure. This happens immediately upon creation of the fistula and causes profound tachycardia. Synchronous with this, vasoconstriction of all peripheral vascular beds occurs. Later, as compensation develops, there is an increase in blood volume and finally an increase in cardiac stroke volume, with a return to a normal cardiac rate.

As you see, this patient has undergone all of these compensatory changes, his blood volume is up, his cardiac size is increased, but his cardiac rate is only 84.

The late changes of course, include cardiac enlargement. This is manifested as dilation and hypertrophy. The local symptoms of A-V fistula are increasing. A continuous bruit accentuated during systole is present. The thrill which is quite strong in this patient has been likened to the motion made by a bee in a paper bag.

The bradycardiac phenomenon produced by manual closure of the fistula is mediated by way of the vagus nerve. When the parasitic circulation is occluded the increased blood volume causes an immediate increase in systolic blood pressure which affects the aortic and carotid baroreceptors and cause reflex slowing of the heart. Of course the diastolic pressure would be expected to rise much more swiftly than the systolic. The reflex is blocked by atropine.

The chronic bradycardiac reflex is demonstrated by closure of the fistula. In this instance, the blood volume dropped from 5175 ml to 4575 ml. Special cardiac studies are shown in the accompanying table.

Table I 20 Year Old A-V Fistula Cardiac Catheterization Data Cardiac Cardiac

	Carac	our area	
	Output	Index	Shunt
At Rest	11.06	6.14	9.1
On Occlusion	3.5	1.94	0.2
Isuprel Infusion	5.49	3.05	2.65
Levophed Infusion	6.42	3.57	3.75
Atropine Infusion	8.18	4.5	5.75
With Exercise	15.66	8.7	

Dr. Otto Trippel: An A-V Fistula of significant size can cause increased length of an extremity during the growth period and has been utilized to increase length of limbs that have been interrupted during growth by polio or other causes.

Dr. Julius Conn: There have been two important reports of such patients, one from Janes' group in Rochester and one from Chicago. In these, femoral arteriovenous shunts have been created to increase limb growth.³ Much important physiology of A-V shunts was demonstrated by the Chicago study. In this, the investigators demonstrated that cardiac enlargement occurred and encroachment upon cardiac reserve appeared in these youthful patients. Fortunately, closure of the fistula was followed by prompt disappearance of the abnormal cardiovascular changes.⁵

Dr. Beal: Dr. Bergan, do you have any comments concerning the untreated A-V fistula? What are the chances of bacteria growing in an A-V fistula?

Dr. Bergan: There really are two reasons for correction of such an abnormal shunt. One is the correction of the low resistance system which compromises cardiac reserve. The second is infection of the endothelium of the fistula. An example of the latter is

the report of Belcher and Turck describing staphylococcal endarteritis in a renal artery to vena cava fistula.²

The object of operation in the patient presented today will be to maintain arterial continuity. The artery above and below the fistula will be exposed and the fistula itself will be closed.

Addendum:

At operation the femoral artery flow was found to be 3500 ml/minute toward the fistula as measured by the electromagnetic flowmeter. Interestingly, superficial femoral artery flow distal to the fistula was 800 ml/minute but was in a craniad direction toward the venous opening. The arterial wall contained the metallic shell fragment. (Fig. 3)

The artery was reconstructed as was the vein. After repair, the femoral artery flow was 500 ml/minute which is higher than normal.

20 Year Old A-V Fistula

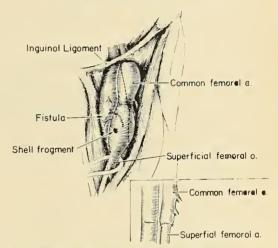


Fig. 3. This drawing indicates relationships of the femoral artery, vein, fistula and shell fragment as they were found at surgical correction.

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FALLS IN INFANCY AND THEIR PREVENTION

The magnitude of the problem of falls in infancy with intracranial injury is not generally appreciated. In a prospective study of falls from elevated surfaces involving infants under one year of age carried out in our private pediatric practice, we collected a total of 28 percent reported falls. Surprised at the frequency of the number of falls occurring in our suburban patients, we questioned 100 mothers seen in the general clinic at Children's Memorial Hospital, Chicago. Seventy-eight of the mothers reported falls from a height during the infant's first year of life. While there were more falls in the clinic patients. most of these accidents resulted from falls from low adult beds, sofas and couches. Falls from greater heights, usually from dressing tables occurred in the suburban patients. Three cases in the surburban group were hospitalized. Two had skull fractures and one had a subdural hematoma. Only one case in the clinic group was hospitalized for a skull fracture.

If the large percentage of falls in infancy were projected nationally, the majority of infants born in the United States are subjected to this type of injury.

What can be done to prevent these ac-

cidents and reduce the neurologic injury which results from falls in this age group? Much more emphasis should be given to the education of parents in accident prevention prior to taking newborn infants home and also in the first months of life. Lutheran General Hospital in Park Ridge has recently placed pictures and posters on the obstetrical and pediatric floors and near the nurseries in an initial campaign to educate all parents regarding falls in infancy.

Physicians, parents, and manufacturer's must become aware of the need for safe equipment for our infants. The design of infant seats, dressing tables, and infant cribs should be carefully studied and improved to provide greater safety.

More research should be done on the long term effects of intracranial injury following falls in the first year of life and subsequent learning problems in child-hood.

The prevention of falls in infants, the most precious and important of our national resources, certainly merits greater attention and effort by the medical profession and by the other organizations devoted to accident prevention and infant welfare.

Harvey Kravitz, M.D.



Summary of Actions

1967 House of Delegates

and

Highlights

of

127th Annual Convention

Illinois State Medical Society

1967-1968 OFFICERS AND BOARD

Officers

President President-Elect 1st Vice president 2nd Vice president Secretary-Treasurer

Newton DuPuy, 1101 Maine St., Quincy 62301 Philip G. Thomsen, 13826 Lincoln Ave., Dolton 60419 George B. Callahan, 4 S. Genesee St., Waukegan 60085 Harold A. Sofield, 715 Lake St., Oak Park 60302 Jacob E. Reisch, 1129 S. 2nd St., Springfield 62704

House of Delegates Speaker of the House

Vice Speaker

Maurice M. Hoeltgen, 1836 West 87th St., Chicago 60620 Paul W. Sunderland, 214 N. Sangamon St., Gibson City 60936

Board of Trustees

1st District 2nd District 3rd District

Carl E. Clark, 225 Edward St., Sycamore 60178, 1968 George E. Giffin, 203 Park Ave., Princeton 61356, 1968 Wm. M. Lees, 7000 N. Kenton Ave., Lincolnwood 60646, 1968 Warren W. Young, 10816 Parnell Ave., Chicago 60628, 1969 Frank J. Jirka, 1507 Keystone Ave., River Forest 60305, 1968 J. Ernest Breed, 55 E. Washington St., Chicago 60602, 1969 William E. Adams, 55 East Erie St., Chicago 60611, 1970 James B. Hartney, 410 Lake St., Oak Park 60302, 1970 Paul P. Youngberg, 1520 Seventh Ave., Moline 61265, 1970 Darrell H. Trumpe, St. John's Sanitorium, Springfield 62700,

4th District 5th District

> Mather Pfeiffenberger, State & Wall Sts., Alton 62004, 1969 Arthur F. Goodyear, 142 E. Prairie Ave., Decatur 62523, 1970 Wm. H. Schowengerdt, 301 E. University Ave., Champaign 61821, 1970

oth District 7th District 8th Distrist

9th District

10th District

11th District

Charles K. Wells, 117 N. 10th, Mt. Vernon 62824, 1969 Willard C. Scrivner, 4601 State St., East St. Louis 62205, 1969 Joseph R. O'Donnell, 444 Park, Glen Ellyn 60137, 1968

Trustee-at-Large

Caesar Portes, 25 E. Washington St., Chicago 60602

Chairman of the Board Arthur F. Goodyear, 142 E. Prairie Ave., Decatur 62523

ADMINISTRATIVE ACTIVITIES

Report of Dr. Portes

Dr. Portes reported a strenuous year, full of activities to further the goals and principles outlined in his acceptance speech given a year before.

Medicare, the Heart, Cancer and Stroke programs, the problems of population growth and the supply of physicians, the need for more paramedical personnel, the question of the physician's image, cooperation with other professions, were all part of his agenda.

Report of Dr. DuPuy

In his inaugural address before the House, Dr. DuPuy stressed the importance of standing with one foot solidly planted in the past with experience so important as the basis for today's actions, and with the other foot firmly in the door of progress. A good example of Pope's "Be not the first by whom the new is tried, nor yet the last to lay the old aside."

He said that the information furnished the society by the Opinion Research Survey should provide the officers and trustees of the state society with the important signposts where change is needed. A careful assessment of "priorities" must be made to determine where the funds of the society should be spent to the best advantage, to provide the membership with the most important of the projects needed and requested. One important responsibility of the board is to spend the dues dollar in the areas where the most return can be secured for the membership.

Vice Presidents

The two vice presidents have attended meetings of the board, served in whatever capacity requested, and participated in society activities with sincere and sustained interest.

Secretary-Treasurer

The secretary-treasurer reported the routine activities in which he has participated. The problem of communication was stressed in his report. The headquarters office mailings to the membership include the IMJ, Pulse, What Goes On, On the Legislative Scene, and occasionally, the Secretary's Newsletter. Unapproved minutes of the board meetings have been mailed out during the past mouths; and efforts

to establish a two way street of cooperation and communication between headquarters and membership have been the most important items on the society agenda.

The change in billing procedures resulted in numerous individual problems which have been of concern to all officers of the society as well as staff. The potential variety of services that this electronically produced data can provide in the future is of sufficient importance to continue this process until it is well established and capable of delivering the information with both speed and accuracy.

The membership statistics as of Dec. 31 (the official date upon which membership in the House is determined under the Bylaws) show that the society experienced a very small loss in membership during the past year—a total of only 19.

The financial statements of the society for the fiscal year 1966 reflected careful investment of funds under the capable guidance of the Continental Illinois National Bank, and conservative expenditure of funds by the various divisions at headquarters.

The year closed with an excess of income over expenses of \$20,761.

Speaker and Vice Speaker

The term of office of Dr. Edward W. Cannady as Speaker of the House closed with this session. The preparation of the booklet, "Your Role as a Delegate," the development of meetings of the trustee district delegates to discuss the agenda and the material provided in the packets for members of the House; the introduction of resolutions by title; the briefing session for chairmen of all reference committees, staff and secretarial personnel, and the careful timing of the agenda, especially for the opening session, have made his term of office an outstanding one. Members of the House expressed appreciation and thanks at the last session, and welcomed the new speaker, Dr. Maurice M. Hoeltgen and vice speaker, Dr. Paul W. Sunderland.

Chairman of the Board

Again, the report of the Chairman of the Board carried only those items not appearing under the reports of the various committees of the society. The board con-



Dr. James P. FitzGibbons, Evanston, was the first physician to register at the Illinois State Medical Society's 127th annual convention. Miss Elizabeth Lynch, of the ISMS staff, presenting him with delegate's badge. A total of 2,817 attended the convention. Total includes 1,630 physicians, 347 guests, 331 exhibitors, and 507 ladies.

templates new procedures and new agenda in order to develop more efficiency and better informed trustees during the coming year. No committee chairmen will appear unless specific requests for Board of Trustees action is a part of their report. All reports of progress will be written and mailed to the board, but not presented orally. The meetings of the Executive Committee will be held at intervals between meetings of the board to provide guidance and supervision for headquarters and staff. The same will be true of the Finance Committee. Then the report of the Executive Committee and the Finance Committee will reflect the basic reason for their existance -the maintenance of supervision and continuity of action between meetings of the Board of Trustees.

The desire of the Executive Committee to have a doctor in headquarters was realized during the interim between Mr. Richards' resignation and the employment of a new Executive Administrator, when Dr. George F. Lull was available to his state society again. His agreement to serve until his successor could be trained gives the committee an opportunity to work slowly and carefully in the selection of an Executive Administrator for headquarters office.

Many of the changes in administrative procedure will be the result of his experience and concern for the welfare of his society.

Policy Committee

The Policy Committee was asked to state

specific policies relative to hospital assessments, and also to the re-appointment of "at least two members whenever possible" on each reference committee of the House in order to provide continuity of experience. This will be a policy statement, but in order to carry out this request, the county medical societies must have returned to the House as delegates, two members of the various committees, or compliance will not be possible.

Committee on Committees

The joint efforts of the Committee on Committees and the Committee on Constitution and Bylaws were accepted almost as presented. It now becomes the responsibility of the Committee on Committees to develop, combine, expand and carry out the wishes of the House that the committee structure of the state society be brought into a more effective and efficient form, not only to carry on the activities of the society, but to make constructive and informative reports to the Board of Trustees. (See Report on Changes in Bylaws)

Committee to Study District Administrative Offices

This committee made a report of progress to the House, and its future activities will be of interest and of importance for the membership of the 1968 House of Delegates. The recommendations relative to regional offices and executive services to one or more counties will be studied.

Membership Committee

The House recommended that the various component societies be urged to develop programs that would encourage the growth of society membership, especially among those physicians who are not in the private practice of medicine.

AMA Delegation

The House expressed pride and appreciation to the delegation and especially to Dr. Walter C. Bornemeier, speaker of the AMA House of Delegates, Dr. Burtis E. Montgomery, member of the AMA Board of Trustees, Dr. V. P. Siegel, a member of the AMA Council on Legislative Activities, Dr. Leo P. A. Sweeney, chairman of the AMA Liaison Committee to the American Legion, and felt that the ISMS was well represented at the national level by the achievements of its members.

FINANCES AND BUDGETS

In the area of finances and budgets the main interest of many of the delegates was centered. After the first year of allocating \$7 to the Benevolence Fund, there was an excess income over expenditures of over \$28,000 which was transferred to the reserve account to develop the endowment balance which eventually may provide most of the needs of this committee.

No request was made this year for an increase in dues. In fact, at the last meeting of the House, the delegates were assured that no raise in dues was anticipated until after 1970, at which time the dues structure and the various programs of the society should be reviewed carefully. During the coming year the division of funds will be broken down as follows:

\$105.00
\$18.00
\$ 2.00
\$ 7.00
\$70.00
\$ 8.00

\$105.00

The Board of Trustees is pledged to return the \$2 to the AMA-ERF if at all possible from whatever source becomes available during the fiscal year—without

drawing upon either the permanent reserve funds nor the contingency reserves. Also, it was the understanding of the House that the amount allocated to the Health Careers Council would be for one year only, and in 1968, the \$2 would be returned to the AMA-ERF.

The House of Delegates requested the board to consider an allocation of \$2,500 to the Committee on Archives for the Sesquicentenial Year celebration for the State of Illinois. The board made this available to the committee with the understanding that it too, was for one year only, and for this specific activity of the Committee of 150 to work with the Sesquicentenial Committee of the state.

The reference committee requested (and the House approved) that the 1966 action of the House be implemented in 1968—"that a complete and itemized financial statement be prepared annually which outlines and defines all expenses (including individual staff salaries, bonuses and expense accounts), plus a breakdown on expenses incurred by all committees and the Board of Trustees" . . . at least 60 days prior to the annual meeting of the House and mailed to all county society secretaries.

CONSTITUTION AND BYLAWS

Major changes were made in the Bylaws, most of which were authorized for presentation to the 1967 House by action taken in May of 1966.

The most important changes involved:

- (1) A state committee which reviews the decisions of a similar committee of a component society, may not have as a member one who currently serves on the same committee of a component society or trustee district. (This involves three areas, grievance, ethical relations and prepayment plans and organizations where decisions at the county level may be appealed and the same committee personnel should not be asked to review the decision made at the county or district level.)
- (2) The chapter on "Discipline" was changed to provide legal counsel for the ethical relations committee and/or the

"respondent." The Ethical Relations Conmittee of the state society was authorized to review both procedure and "law" in cases appealed from the county or district committees.

- (3) In the chapter pertaining to committees, most changes resulted from the adoption of last year's reference committee report requesting that the election of committee personnel be removed from the House and placed within the Board of Trustees. By developing an entirely new chapter, four types of committees will now be appointed:
 - a. Standing committees; (called Councils)
 - b. Conference committees of the House of Delegates
 - c. Ad Hoc committees
 - d. Board of Trustees committees.

All members of the Board (officers and trustees) and AMA delegates were ruled not eligible for appointment to councils.

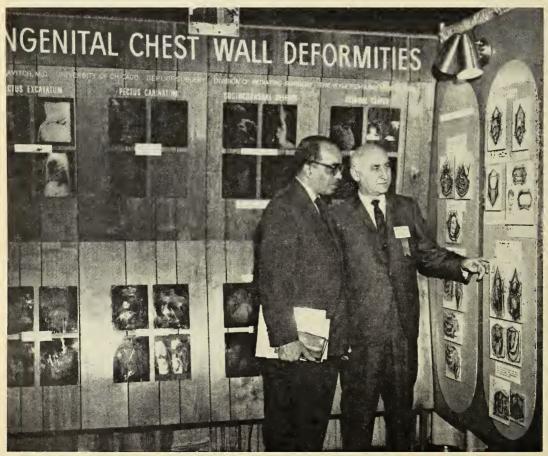
Precautions were taken to protect the chairman of councils, sub committees and special committees to provide an opportunity to appear before the board upon special request. All committees are to submit an annual report to the House.

(4) The resolutions referred to the committee resulted in a change in the membership of the House of Delegates. The composition of the House (voting members) will be the delegates elected by the component societies, the president, president-elect, the secretary-treasurer, the speaker (or vice speaker when presiding) and the trustees.

The non-voting members of the House were named as the vice presidents, the vice speaker (when not presiding) the past trustees, past speakers, past presidents, general officers of the AMA, and the delegates from the ISMS to the AMA.

This was a compromise action, since the original resolution requested that the voting membership of the House be limited to the elected delegates from the county medical societies only.

The reference committee recommended (and the House concurred) in not adopting the other two resolutions referred to this committee—(1) the right of appeal when membership is denied "for any cause" since the Bylaws now provide for appeal if a physician has been denied membership because of "race, color, creed or ethnic origin" and (2) the request that the terms of office for trustees and AMA delegates be limited by the Bylaws. This request was denied since the House has the power to evaluate adequately the services of its representatives and replace them accordingly.



Dr. C. R. Frazer, Jr. (left), East of St. Louis, and Dr. Caesar Portes retiring ISMS president, examining award-winning scientific exhibit, "Congenital Deformities of the Chest Wall," exhibited by Mark M. Ravich, M.D., of the University of Chicago, Wyler Children's Hospital. The exhibit won the ISMS gold award for most original work and the Mead Johnson Aesculapius Award for the most outstanding scientific exhibit.

ECONOMICS AND INSURANCE

Most of the problems of a controversial nature came before the Reference Committee on Economics and Insurance—Relative Value, Prepayment Plans, Hospital Relations, Usual and Customary Fees, Blue Cross-Blue Shield, and consideration of the proposed service plan for the employees of United States Steel.

- (1) The reference committee recommended (and the House approved) that the joint conference of the ISMS and the Illinois Hospital Association be continued in the future.
- (2) The continuation and the expansion of the "usual and customary fee concept" was approved—this will apply to all agreements between the society and third parties. The committee called attention to the apparent success of this principle as it is being developed by the Illinois Department of Public Aid, and the House voted to approve and extend this program, providing for review at appropriate intervals.
- (3) To quote in full: "The Illinois Medical Service (Blue Shield) has asked the approval and cooperation of the medical profession in its proposed programs. Specifically, this would be an agreement by participating physicians to accept their usual and customary fees for all services. In turn, Blue Shield has agreed to refer all disputed fees to county medical societies for adjudication, and it will recognize the right of appeal to the district and/or state prepayment plans and organizations committee. Blue Shield has agreed to abide by the decision of the medical society's review committee in its adjudication of disputed fees.

"Blue Shield has further agreed to adopt the definitions of usual and customary as defined and adopted by the ISMS at its House of Delegates meeting in May, 1966. By accepting the usual and customary fee concept, Blue Shield will recognize the necessity for additional compensation in unusual circumstances and when medical complications require additional time, skill and experience. It has agreed to recognize the necessity for physicians to increase their fees in response to changing economic conditions and that reimbursements will take cognizance of these conditions within the context of the society's definitions of usual and customary.

"Your reference committee would like to re-emphasize the importance of Blue Shield's willingness to refer disputed fees to the county medical societies for adjudication and that it will abide by the decision of the medical society's review committee."

The reference committee pointed out that by extending the usual and customary concept to all future insurance programs, this would provide a practical approach for reimbursing physicians for their services; that such future plans established on this concept with the absence of participating agreements will maintain the doctorpatient relationship; and that by definition, the vast majority of physicians will rereive their full billing. In addition, these programs must provide the patient a free choice of physician and specifically permit the physician the right to PRIOR CONTRACT WITH THE PATIENT.

The reference committee recommended (and the House concurred) the support of this and any insurance carrier program in its application of the usual and customary fee concept as developed by the ISMS incorporate free choice of physician in future insurance programs.

Also approved was the recommendation that any dispute over fees in such a program be referred to a committee of the local county medical society for adjudication.



Dr. George F. Lull (left), Executive Administrator of the Illinois State Medical Society, congratulating Dr. Samuel J. Burrows of Chicago on the latter's initiation into the ISMS Fifty-Year Club. Dr. Burrows was among 54 Cook County physicians taken into the club during the convention. All are 1917 medical school graduates. Dr. James Hutton, Chicago, past president of ISMS and a member of the club, was the speaker at a luncheon honoring the new members.

LEGISLATION AND PUBLIC AFFAIRS

The reference committee commended the Committee on Narcotics and Hazardous Substances for its leadership and for the outstanding Conference on Narcotic Addiction conducted this past year. The committee expressed particular interest in the next committee project—development of a handbook on drug abuse to be used for educational purposes in the schools.

The Committee on Legislation has had an excellent and outstanding record this year working with the 75th General Assembly, not only for the passage of bills pertaining to health but also in the development and passage of bills promoting the safety and general well-being of the residents of Illinois.

The passage of legislation dealing with flammable fabrics, work in the area of medical examinations for school children, opposition to the proposed tax on medical services, and support of S.B. 1396, dealing with the corporate practice of medicine, represent the various areas of activity in which our committee in Springfield participates.

In furthering its campaign to outlaw flammable fabrics, Illinois' delegates to the AMA will be instructed to ask the national organization to supplement its public awareness campaign by encouraging legislation to prohibit extremely flammable fabrics from being used, especially in hospitals, nursing homes, etc., and also in orphanages.

The Illinois State Medical Society will initiate legislation to amend the School Code of Illinois to provide that medical examinations for school children be given within a reasonable period of time (not to exceed six months) before entering kindergarten or first grade, fifth grade and ninth grade. The code now calls for such examinations immediately prior to or upon entering these grades.

Stating that the proposed tax on medical services in Illinois "would be tantamount to placing a tax on sick and suffering people . . ." the House of Delegates voted to petition the General Assembly to exclude from terms of the proposed tax bills all those engaged in the healing arts or, in the alternative, to defeat these bills.

In reporting favorably on resolutions prohibiting the corporate practice of medicine, the reference committee said, "This is of the utmost importance to all physicians since it has much to do with keeping the practice of medicine in the hands of physicians. Your committee was particularly interested in reviewing a publication distributed by the Illinois Hospital Association in opposition to S.B. 1396, a portion of which reads as follows:

"This bill would hamstring a movement towards full-time hospital centered practice that is now making a major contribution to scientific progress in medicine."

The committee has developed the pamphlet "On the Legislative Scene" which has made it possible for the membership to stay abreast of all the important legislation in Springfield. The Committee on Public Affairs has worked closely with the physicians and their wives to encourage them to participate in the political activity of the party of their choice, and to actively support the ISMS public affairs program.

PUBLICATIONS & SCIENTIFIC SERVICES

The Reference Committee on Publications and Scientific Services, reporting that it had heard voluminous testimony on the special problems of medical education, recommended that "the Millis Report be accepted in principal as a fresh approach to the problem" of producing more practicing physicians in both the urban and rural areas of Illinois, but it refused to endorse the report in its entirety. Noting the need for more family physicians in the state, the committee said that "if the length of time required to become a practicing physician is lengthened in the

next several years, there will be a sudden shortage of new practicing physicians."

The House accepted the committee's recommendation that a "comprehensive rotating internship should be retained until such time as the newer concepts of training have been proved in practice."

The House also adopted recommendations that (1) new medical schools be established in Illinois, at least one of which should be outside the Chicago area; (2) all physicians trained to practice in Illinois be encouraged to have a comprehensive rotating internship, and (3) the existing medical schools, both private and public, be subsidized by the State of Illinois on the basis of number of students.

In addition, the House adopted a resolution urging the establishment of a Department of Family Practice at the University of Illinois College of Medicine, referred to the Board of Trustees a suggestion that a new Ad Hoc Committee on Medical Education be appointed and required to meet and report to the board quarterly, and, finally, that two members of the American Academy of General Practice be included in the membership of the Commission called for by the Millis Report.

The reference committee endorsed the Committee on Nursing recommendation that "all members of ISMS support the diploma schools of nursing." The House not only concurred in this recommendation, but included the licensed practical nursing school program as worthy of physician support.

A resolution requesting the Illinois Department of Public Aid to increase monetary allowances for food to meet the U.S. Department of Agriculture's "Moderate Cost Diet" was approved by the reference committee as no one appeared in opposition.

On the floor of the House, however, a number of delegates, including the chairman of the Medical Advisory Committee to the Illinois Department of Public Aid opposed it, substituting a provision that the Department of Public Aid be requested to continue its educational efforts with a view to improving recipients' use of money and food stamps in the purchase of food. This was accepted by the House.

The Committee on Perinatal Mortality, having completed a pilot study in selected counties of the state, was officially discharged by action of the House.

In other actions, the House recommended the continuation of tuberculosis sanitoria in Chicago and Mount Vernon, urged that properly qualified and interested physicians be seated on hospital governing boards, and that the Joint Commission on the Accreditation of Hospitals be requested to revise its ruling so that the use of externs under proper supervision may be approved for recording history and physical examinations on patients' charts in non-university affiliated hospitals.

In connection with the controversial subject of abortion laws, the House adopted an amended resolution stating that the "Illinois State Medical Society endorses the formation of a Commission to Study the revision of the Illinois Abortion Laws as outlined by Rep. Kleine in House Bill 372.



Mrs. Sherman C. Arnold (right), Woman's Auxiliary representative to the ISMS Committee on Medicine and Religion, "manned" the committee's booth at the convention. Shown visiting the exhibit are (from the left) Mrs. Adele Henrichsen, Director of Public and Professional Education for the Chicago Unit of the American Cancer Society; Mrs. Morris Stein, Chicago member of the auxiliary who is also active in the Cancer Society, and the Rev. Christian Hovde, Director of Bishop Anderson House, Chicago, and a member of the Committee on Medicine and Religion.

PUBLIC RELATIONS

A new resolution concerning physician association with cult osteopathic practitioners was amended, and subsequently adopted by the House of Delegates, to reaffirm the established policy of the Illinois State Medical Society as frequently stated in the past: Any voluntary professional association between a member of the ISMS and an osteopath is unethical.

On recommendation of the Reference Committee on Public Relations and Miscellaneous Business, the House adopted a resolution, introduced by the Wayne County Medical Society, reaffirming the ISMS "traditional policy and position that a practicing physician may ethically dispense medications and other appliances so long as there is no exploitation of the patient, and that the practicing physician be encouraged to provide patients with the most economical and efficient total medical care possible, and that he be encouraged to experiment with new ways of organizing and delivering medical services, keeping in mind the best interests of the patient."

A resolution directing delegates to the American Medical Association to work for certain provisions in any new federal draft law was presented to the House in amended form by the Reference Committee on Public Relations, but was tabled by vote of the House.

OPINION RESEARCH SURVEY

After Opinion Research, Inc., presented the results of its survey of the Illinois State Medical Society to the 1966 House of Delegates, a task force was appointed to study the survey and make recommendations to the 1967 House. Speaker Edward W. Cannady, M.D., appointed a special reference committee to review the work of this task force and it presented the following report which was officially accepted by the House:

Your Reference Committee to review the Opinion Research Survey and to review the report of the Task Force appointed to study the survey met to hear testimony. This covered four specific areas of discussion involving administration, legislation, public relations and scientific services.

ADMINISTRATION

- 1. Your reference committee recommends incorporation of modern data processing in support of administrative and membership programs and recommends that this be studied by the Finance Committee as to feasibility.
- 2. The state medical society is to be complimented on their sincere effort to improve communications and the reference committee recommends that each delegate carry to his county society the need for bilateral communication. Grass root initiation for inquiry and initial response will spell the success of this program.

The availability of trustee minutes has been invaluable in keeping the delegates informed and abreast of the times. Proposals of card surveys and wider participation of Illinois state members-at-large in reference committee deliberations are suggested as having considerable merit.

3. Earlier movement of younger men into positions of local and then state society responsibility will be better facilitated by earlier effective contact with men in both medical school and in postgraduate training programs. It is here that crystallization



Jon Waltz (left), professor of law at Northwestern University, who discussed "The Medical-Legal Aspects of the Jack Ruby Trial" at the annual Impartial Medical Testimony Luncheon. He is shown with Dr. Clinton L. Compere, chairman of the IMT Committee.

and communication of goals of the society and beneficial services offered may be most rewarding. It is here that further liaison with SAMA and a more vigorous and imaginative leadership in our Ad Hoc Committee on Medical Education may be beneficial.

We would support the Resolution No. 11 requiring this Ad Hoc Committee to make quarterly reports to the Board of Trustees concerning their progress in this vital field.

Several ways were discussed whereby constituent societies could contact local area residents who are presently in school or postgraduate training, attempting to interest them in local and state society programs for the purpose of acquiring them as future members.

4. Official policy statements of ISMS should only be made by those entitled so to do and after proper authorization.

LEGISLATION

- 1. Information concerning possible and probable legislative activity at all levels of government, even though seemingly remote, should be sent by all members of ISMS to a central clearing house at the state society office for review, comment or action by the Legislative Committee with a report back by the Legislative Committee to all constituent societies.
- 2. Furnish legislative information and methods to all medical school students at schools within the state or whose home is within the state, as well as all society members, in an effort to educate them to their rights, privileges and duties as citizen physicians.
- 3. Supply information to designated "key men" at all county society levels from the state office with concise, to the point, legislative information at least to monthly county society meetings and hospital staff meetings. A "field man" from the state office could be well utilized for this purpose when necessary. It is suggested that regional meetings with local legislators be continued.

PUBLIC RELATIONS

1. The committee commends the individual physician who practices his own good public relations, but we feel that attention should be called to lay criticisms of certain present day practices known to be

detrimental to the physician image, as well as advice on how to handle certain practice problems.

- 2. Your reference committee suggests reevaluation of the public relations program, including the Dr. Sims' image. It was felt that we should emphasize the services we render the public in improving medical care. The committee strongly endorses the distribution of state medical society informational materials to physicians who begin practice in this state. We feel this should contain a list of committees and that the doctor should be encouraged to check those areas of interest in which he might be willing to serve. If possible a personal contact by the trustee or by trustee and staff should be made with every newly practicing physician in the state.
- 3. The committee recommends that a positive program of physician recruitment for Illinois be implemented and we assume the Health Manpower Committee, if it is set up, will work toward this end.

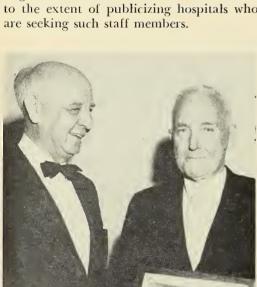
SCIENTIFIC SERVICES

1. Your reference committee wishes to compliment the Journal Committee on its excellent work. The reference committee recommends that a color, rather than black & white, be used for the front page of the Journal. It is also suggested that colors be employed to designate the various parts of the Journal which might be designed for specific subject areas such as yellow for socio-economic and legislative affairs, blue for office management, and they should continue their studies relative to format as a whole.



Dr. LeRoy P. Levitt (right), dean of Chicago Medical School, accepting \$148,989 on behalf of Illinois' five medical schools. The money, presented by Dr. Philip G. Thomsen, chairman of the ISMS Finance Committee, represents contributions by Illinois doctors to the AMA Educational and Research Foundation.

- 2. Your reference committee recommends that the medical society encourage the development of symposia on special subjects during the year, and that this material could then be prepared for publication in the Journal. A case in point is the recent symposium on narcotics, the material of which should be most valuable for the phy-
- 3. It is strongly suggested that a segment of the Journal be devoted to the office administration and business practice of medicine. In line with this thought, it is suggested that perhaps members of the Illinois Clinic Managers Group or other professional management groups might be of great help in assembling the type of material that could be presented.
- 4. The committee encourages all physicians of the society to submit papers on some original observations or ideas which could be developed on a single page of the Journal, subject to approval by the Editorial Committee.
- 5. The committee believes that one page might be devoted to interns and residents to the extent of publicizing hospitals who are seeking such staff members.



Dr. Charles B. Huggins (right), who shared a Nobel Prize in medicine last year, was named Illinois' outstanding medical educator of 1966. He is shown receiving the Edwin S. Hamilton Teaching Award from George B. Callahan, M.D., new first vice president of ISMS.

6. It is suggested by the committee that teaching hospital libraries be given multiple copies of the ISMS Journal, at no charge.

ANNUAL MEETING

- 1. The Board of Trustees is urged to continue to explore possibilities of combined meetings with other medical organizations.
- 2. Your reference committee suggests that an area in the scientific exhibits be designed for the exhibits of art and other examples of the physician's activities outside of the area of medicine.
- 3. Your reference committee recommends that the Ad Hoc Committee on Medical Education meet with representatives from the five medical schools to study the feasibility of integrating their postgraduate education programs to aid the physicians of our state.

Your reference committee wishes to commend the task force appointed to study the Opinion Research Survey for their excellent presentations. We realize that many hours were devoted to deliberation.



Caesar Portes (left), M.D., retiring president of the Illinois State Medical Society, with Rep. Thomas Curtis (R-Mo.), who delivered the annual Camp Memorial Lecture at the Public Affairs Dinner. Curtis, a ranking member of the House Ways and Means Committee, spoke on "A Prescription for Good Government."

ACTION ON RESOLUTIONS 1967 HOUSE OF DELEGATES

Numb	er Introduced by:	Subject	Action
67M-#	1 Kane County	Membership in House	Substitute action taken
#2	Lake County	MD's authority in Nursing Home Calls	Referred back to Lake County for clarification
#3	Lake County	Care of Patients Under Title XIX, PL 89-97	(1st Resolve: to AMA) (2nd Referred to B. of T.)
#4	Lake County	Personnel of Joint Commission	NOT adopted
#5	McLean County	Certification of Medicare Patients (considered with Resolutions	To AMA (substitute resolution) #7 and #8)
#6	Clark County	Medicare Forms	Refer to Correct Committee for Study
#7	Clark County	See #5	
#8	Crawford County	See #5	
#9	Henry Stark County	ISMS and AMA Dues	No action
#10	Henry Stark County	Association with Cult Osteopaths	Substitute Resolution adopted
#11	DuPage County	Ad Hoc Committee on Medical Education	NOT adopted
#12	Will-Grundy	Acceleration of Reciprocity	NOT adopted
#13	Will-Grundy	Physicians on Hospital Boards	Adopted
#14	Will-Grundy	Examination of School Child	Substitute resolution adopted as amended by House
#15	Wayne County	Dispensing of Drugs & Appliances	Adopted
#16	Madison County	Functions of Utilization Committees	To AMA as amended
#17	English for Pathologists	Blood Banking Services	Referred to Committee on Laboratory Evaluation
#18	Maher for Archives	\$2500 for Sesquicentennial	Referred to Board after House approval and implemented by Board action
#19	Sangamon County	UMW & Social Security Administration	To AMA and refer to committee
#20	A. D. Klinger	Right of physician to appeal for membership	NOT adopted
#21	Fulton County	Financial Support for Health Careers Council	Approved by House; Referred to B. of T. and implemented by Board action
#22	Macon County	AMA Group Disability Insurance (Considered with Resolution #	Adopted and to AMA #44)

for July, 1967

#23	Lake County	Payment of Hospital based Specialists	Adopted
#24	E. A. Piszczek	National legislation re. Flammable Fabrics	Substitute Resolution Adopted and to AMA
#25	Will-Grundy	Opposition to Tax on Medical Services	Considered with #40 and substitute resolution adopted
#26	DuPage County	Revision of the Medical Practice Act of Illinois	Referred to Committee on Legislation
#27	Herschel Browns	Support for the Millis Report	NOT adopted
#28	E. K. DuVivier	Physical Exam for Preschool Children	Referred to the Committee on Child Health
#29	CMS	Rulings of Joint Commission Re: Use of Externs	To AMA—Copy to Joint Commission Adopted
#30	Henry-Stark	Millis Commission— (two members of Commission Education be from Academy of	
#31	Tazewell County	Payment of Utilization Committee Members	Not Adopted
#32	Peoria County	Availability of reports of Reference Committees	Substitute resolution adopted
#33	Peoria County	Physical Therapy & Department of R. & E.	Referred to Board for consideration
#34	C. J. Jannings	Corporate Practice of Medicine SB 1396	Adopted
#35	Wm. Lees	Essentiality of Existing TB Sanatoria	Adopted (Letter sent to Governor with copies to 75 General Assembly)
#36	Coye Mason	Corporate Practice of Medicine	Considered with #34 and therefore not adopted
#37	Frederick Weiss	Supply & Distribution of Physicians	Referred to Board for Study
#38	Frederick Weiss	Millis Report (intern training)	NOT adopted
#39	Frederick Weiss	Terms of office for Trustees & AMA Delegates	NOT adopted
#40	V. P. Siegel for Legislation	Opposition to SB 1331 thru #1336 (Considered with Resolution I	Substitute resolution adopted No. 25)
#41	Theo. Grevas	Participation in Public Affairs	Substitute resolution adopted
#42	Macon County	Draft of Physicians	Resolution tabled
#43	Logan County	Promotion of Family Practice	Adopted
#44	AMA Delegation	AMA Disability Insurance	Sent to AMA-adopted

Medicine and Religion

Respect the Clergy

By Robert S. Mendelsohn, M.D.
Chairman, Illinois State Medical Society Committee
on Religion and Medicine

Underlying the formation of Religion and Medicine committees by local and state medical societies is a growing recognition of the role of religion in patient management.

Through these committees, medicine hopes to promote an atmosphere of mutual respect between doctors and clergy. Certainly, the two professions have much in common—for example, an innate desire to serve mankind—but each also has certain skills, knowledge and perspectives that are unique.

This very uniqueness may at times make it appear that the professions have conflicting goals. To the doctor, a person who is ill is a patient, but to a clergyman, that person is a parshioner. Consequently, the two may be included to think and speak in different terms.

Because the doctor's concern and competence is directed towards the patient's physical well-being, it may sometimes appear that he is apathetic towards the contributions the patient's clergyman can make.

The impression may be enhanced should the physician interrupt a clergyman's consultation with the patient, or disregard perhaps through ignorance of a particular religion—a patient's desire to observe a tenet of his church.

Discussions at meetings of the ISMS Committee on Religion and Medicine indicate that this can be a very real source of frustration in doctor-clergy relationships. A lack of understanding by the doctor of the

clergyman's role may at times leave the latter feeling that he is forced to function in an antagonistic environment—and his particular skills are unwanted, unappreciated, and perhaps resented.

These same discussions have made it clear that the clergyman wishes only to be accepted as a valid member of the healing or therapeutic team—one who is trained as a specialist in his particular area of patient care.

Certainly, the contention that ministers are specialists is valid. Seminaries of all major denominations throughout the nation are increasingly aware of the importance of clinical pastoral training as an essential part of the education of ministerial candidates. Many seminaries require such a period of training, and incorporate several hours a week of clinical experience in hospitals.

The clergyman is mindful of the physician's place as captain of the health team. It follows that the doctor, as the captain, has a responsibility to know what each member of his team can contribute to the patient's welfare.

As the doctor gains that knowledge of the clergyman's potential contribution, his appreciation—and his respect—will also grow. It is quite likely that both physicians and ministers will then find that their differing insights and competence and abilities are complementary. As a result, their mutual efforts will be richer and more rewarding.

The Concept of Usi

Sweeney Explains Blue Shield's Position

By Marvin Schroder
Illinois State Medical Society
Division of Public Relations and Economics



Leo P. A. Sweeney, M.D.

Payment of usual and customary fees by third parties was one of the more vigorously-debated issues of the recent ISMS annual meeting. The issue resulted from a request from the Blue Shield Plan of Illinois Medical Service for ISMS support of a program in which Blue Shield will pay the usual and customary fees of physicians who treat Illinois steelworkers and their families. The House of Delegates accepted a recommendation that ISMS support the Blue Shield program, "and any insurance carrier program in its application of the usual and customary fee concept." To learn more about the Blue Shield program for steelworkers-which becomes effective Aug. 1, 1967-the ISMS Division of Public Relations and Economics talked with Dr. Leo P. A. Sweeney, president of the Blue Shield Plan.

Q. Dr. Sweeney, what's the concept behind programs which pay physicians their usual and customary fees for services to beneficiaries?

A. These programs are based on the concept that doctors are entitled to reimbursement on the basis of their usual charges, rather than to an arbitrary schedule of allowances.

Q. Why has Blue Shield adopted this concept?

A. For several reasons, including our belief that it offers a formula for overcoming some of the inequities that have existed under present programs. In addition, today's prepayment market demands usual and customary programs, and Blue Shield has been unable to meet those demands with its indemnity offerings.

Q. To what "inequities" do you refer?

A. Blue Shield, for example, is aware that many physicians have not been paid realistic allowances under existing indemnity programs. Our desire to maintain palatable, salable and comfortable rates for subscribers has been partly responsible for this in some areas.

Q. Will Blue Shield abandon its indemnity programs in the future?

A. Not at all. We will remain basically an indemnity contract operation, with benefit allowances related to indemnity schedules. We certainly don't contemplate any rapid or large-scale conversion to usual and customary programs of the thousands of groups now covered by indemnity programs. However, we do feel that it is absolutely necessary that usual and customary programs be among the contracts Blue Shield offers the public.

(Continued on page 82)

d Customary Fees

Why Steelworkers' Program Was Approved

By Philip G. Thomsen, M.D., Chairman, Committee on Usual and Customary Fees

Upon recommendation of the Committee on Usual and Customary Fees, the 1967 ISMS House of Delegates voted approval of a Blue Shield proposal to pay usual and customary fees to physicians who treat Illinois steelworkers and their families. The proposal was not without opposition among some delegates, who questioned why the committee recommended its acceptance. Basically, we did so because:

- 1. The Blue Shield program is in accordance with the House of Delegates' position that physicians should be reimbursed on the basis of their usual and customary charges.
- 2. Blue Shield agreed to accept medical society adjudication of disputed fees, and agreed to accept the society's decision.
- 3. The committee knows such programs do work. This is not a guess—the joint ISMS—Illinois Department of Public Aid program in which physicians are paid usual and customary fees for services to welfare patients is testimony to the workability of the concept.
- 4. ISMS endorsement of the Blue Shield program, the committee felt, is a realistic reaction to an economic fact.

That fact is that full payment of physician services through third party programs is increasingly in demand. Patients favor it and labor and management insist upon it. As a result, more and more of these third party full payment contracts are being written.

To resist this trend would only lead to a splintering of the profession—with some physicians participating in the programs and others remaining aloof.

Aloofness, of course, is the individual's privilege, but the committee was acutely conscious of its obligation to the profession as a whole. Aesop said it well, "United we stand, divided we fall!" Fragmentation of the profession over this issue could easily



Philip G. Thomsen, M.D.

sap the medical society's strength in ensuring continued payment of realistic fees, because the right of the medical society in fee adjudication would be forfeited.

Consequently, the committee felt that it must protect the society's rights and bargaining powers—and it felt that this could best be done through cooperative efforts with Blue Shield.

Of course, the committee believes there are other advantages to supporting the proposed program. There are advantages to the individual physician—direct payment of his usual fee, in most instances; reduction of bookkeeping time and expense; elimination of irksome money discussions with patients; and the privilege of adjusting fees as the costs of medical practice rise.

(Continued on page 80)

Blue Shield

(Continued from page 79)

Then, too, there are the guarantees offered by Blue Shield which are intended to assure the program's success. In addition to the fee adjudication agreement, Blue Shield has accepted ISMS's definitions of usual and customary; has agreed to recognize those legitimate cases in which unusual circumstances might entitle a doctor to a fee higher than his usual charge; and has given assurances that constantly updated data will be used to determine the physician's usual and customary fee.

Keep in mind that approval by the House of Delegates does not commit any doctor to participation in the program. House action means only that ISMS approves it—and other programs embodying the usual and customary concept—as a worthwhile program for its members.

Serendipity

(Continued from page 48)

vein in the mastoid process. The dilemma: What to do?

I recalled having read somewhere that gentian violet was bacteriostatic to cocci and methylene blue affected bacilli. I had some concentrated Gruber dyes but was not sure they were entirely safe for intravenous administration. As the patient's condition did not improve and a fatal outcome seemed likely, I persuaded the parents to allow me to give him an injection on Saturday just as they were taking him home "to die." A 1 percent solution of gentian violet was made, filtered and boiled and 10 c.c. were given intravenously.

The following morning the patient was visited at his farm home. He was greatly improved, and the temperature remained normal for the first time in two weeks. On Monday he had a slight rise in temperature and an effusion was noted in the synovial sac of the right knee. This was aspirated and a second injection of gentian violet was given. One more injection was given two days later. A chill followed each injection, but his convalescence was rapid thereafter. He is now a husky farmer and a grand-father.

This report is submitted to suggest that maybe this therapy should be thought of in this day of penicillin reactions and overuse of many antibiotics.

Tandearil®

oxyphenbutazone

Therapeutic Effects: Tandearil is a nonhormonal compound which may rapidly resolve inflammation and help restore normal joint function. Its action does not affect pituitary-adrenal function or impair immune responses. Its value in osteoarthritis is especially noteworthy because this disorder responds inconsistently to steroids and is often resistant to salicylates. Further, indomethacin is limited only to osteoarthritis of the hip, whereas oxyphenbutazone is effective in all forms of the disease.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Osteoarthritis: The initial daily dosage in adults is 300-600 mg, in divided daily doses. When improvement occurs, dosage should be decreased to the minimum effective level; this should not exceed 400 mg, daily, and is often achieved with only 100-200 mg, daily.

For complete details, please refer to full prescribing information. 6562-VI(B)R

Availability: Tablets of 100 mg.



Geigy Pharmaceuticals Division of Geigy Chemical Corporation Ardsley, New York

Geigy

Tandearil® oxyphenbutazone

helps osteoarthritic joints move again



Please see adjoining page for brief prescribing summary.

TA-4919 PC

Sperling, I.L.: 3 Years' Experience with Oxyphenbutazone in the Treatment of Rheumatic Disorders, Applied Therapeutics 6:117, 1964. Watts, T.W., Jr.: Treatment of Rheumatoid Disorders with Oxyphenbutazone, Clin. Med. 73:65, 1966.

3 out of 4 osteoarthritics completely or markedly improved

76.9% of 407 patients

84.6% of 39 patients

Usual & Customary Fees

(Continued from page 78)

Q. Will all Blue Shield usual and customary programs be written on a paid-in-full basis?

A. No. The contract with the steelworkers is written on that basis because both labor and management have agreed upon paid-in-full benefits.

Q. Then the concept of "usual and customary" does not automatically imply a "paid-in-full" contract?

A. Definitely not. Usual and customary programs can easily provide for the inclusion of co-insurance or deductibles.

Q. Why did Blue Shield ask ISMS support and approval of this program?

A. Because we believe that usual and customary fees programs will work most effectively when there is a sharing of understanding and responsibility between carriers and physicians. We feel it is essential that we have ISMS cooperation, particularly for purposes of adjudicating unusual fees.

Q. Dr. Sweeney, what will Blue Shield regard as "usual and customary" fees?

A. We have adopted the ISMS definitions of "usual" and "customary." As you know, ISMS defines a "usual" fee as that fee usually charged for a given service, by an individual physician to his private patient. And a fee is "customary," by ISMS definition, when it is within the range of usual fees charged by physicians of similar training and experience, for the same service within the same specific and limited geographical area.

Q. What data is Blue Shield using to determine the range of customary fees in a given area?

A. Using current charge data, we have developed a profile of usual fees for individual physicians. From these profiles, we have an accurate picture of the range of customary fees in the area in which the physician practices. Of course, this range will be updated constantly and only the latest data will be used.

Q. Does a doctor's individual fee profile serve—in effect—as his fixed fee schedule?

A. Indeed not, This is not a fixed fee schedule program. A doctor's fees are not "frozen" and he is free to increase them at any time, when he does so for all his patients. Blue Shield anticipates that as times and conditions change, fee increases will be necessary.

Q. And Blue Shield will pay these higher fees?

A. Yes, provided they do not exceed the customary fees in the physician's area. Obviously, individual fee changes will directly affect an area's range of customary fees.

Q. What happens if a doctor charges a patient more than his usual fee for a particular service?

A. In such cases, Blue Shield will seek to determine if there were unusual clinical circumstances or medical complications involved. Of so, the fee will be paid.

Q. And if not?

A. Then the physician's usual charge, up to the customary charge for that area will be paid, and the doctor will be given an explanation as to why he was not paid the amount he billed.

Q. Does the physician have to accept Blue Shield's decision?

A. He does not. He may request a review of the case by a committee of his local medical society and he has the right of appeal to his district and state Prepayment Plans and Organizations Committee. Blue Shield, too, has the right to request review and to appeal.

Q. What if the review committee rules against Blue Shield?

A. We have agreed to abide by the state Prepayment Plans and Organizations committee's decision in its adjudication of disputed fees.

Q. Under the usual and customary program, does the doctor forfeit his right to make prior arrangements with a patient regarding the fee to be charged?

A. No. Any prior agreement with his patient regarding charges above the doctor's usual and customary fee takes precedence over this program. However, Blue Shield cannot pay in excess of the physician's usual fee, up to the customary charge in the area.

(Continued on page 110)



AMODEX® Timed capsules
Each AMODEX TIMED CAPSULE contains:
dextro-amphetamine HC1
amobarbital (barbituric acid derivative)
WARNING: may be habit forming

DOSAGE: One capsule on arising or at breakfast. Drugs are released gradually over 6 to 8 hours, providing therapeutic effect for 10 to 12 hours.

INDICATIONS: AMODEX Timed Capsules elevate the mood, relieve nervous tension, restore emotional stability and emotional capacity for physical and mental effort. AMODEX Timed Capsules are extremely useful in the treatment of anxiety states and may be used to control appetite in the management of the obese patient — without nervous excitation.

SIDE EFFECTS AND PRECAUTIONS: Frequent or continued use may cause nervousness, sleeplessness, or restlessness. Individuals suffering from high blood pressure, heart disease, diabetes, thyroid disease, lung ailments, or kidney disorders should not take this product. It should not be taken over a long period of time.

CONTRAINDICATIONS: Hyperexcitability, agitated pre-psychotic states. Sensitivity to Amphetamines or Barbiturates.

CAUTION: Federal Law prohibits dispensing without prescription. SUPPLIED: In bottles of 30, 100, and 1000 capsules.

Fellows Testagar

pharmaceuticals since 1866 Detroit, Michigan

An Important Development in Penicillin Therapy

Beecham Group Ltd., London, England, worldwide manufacturer of ethical pharmaceuticals, achieved international renown by isolating the penicillin nucleus in 1957. Subsequently, Beecham developed and marketed a series of unique semi-synthetic penicillins, which are today widely used by practicing physicians.

Papers in the English medical journal "The Lancet" of June 3rd indicate that Beecham Group Ltd. has now made another important discovery arising from their long-term program of penicillin and allergy research. The papers describe the way in which a highly allergenic fraction was discovered and removed from the commonly

used injectable penicillin G.

Normal commercial forms of penicillin G contain very small amounts of this highly allergenic fraction which is thought by Beecham's scientists and their advisers to be largely responsible for patients becoming hypersensitive to penicillin. Although penicillin has always been considered one of the safest antibiotics, the fact that a few patients become allergic to it has long been recognized.

Beecham emphasizes that this purified grade of penicillin G (Purapen G) is not recommended for the deliberate treatment of patients known to be hypersensitive to penicillin. But the great importance of the introduction of Purapen G is that it is less likely to induce penicillin hypersensitivity in patients not already sensitized and, therefore, its general adoption could result in a much lower incidence of penicillin allergy in the future.

This discovery stemmed from observations made at Beecham's laboratories by Dr. J. G. Feinberg and his colleague, Miss Janet Dowdney, and Mr. R. D. Weston and later confirmed and extended by a larger team led by Mr. F. R. Batchelor. An important contribution has been the clinical collaboration provided by Dr. G. T. Stewart, Professor of Epidemiology and Pathology, University of North Carolina, Chapel Hill, N.C., who carried out confirmatory clinical investigations while at Queen Mary's Hospital, Carshalton, Surrey, which, together with additional research work, he has now re-

ported in "The Lancet." While penicillin has always been regarded by the medical profession as one of the safest of all treatments for many bacterial infections, this new contribution to knowledge and safety will be welcomed all over the world.

At this time, while Purapen G is not commercially available in the U.S.A., research and development work to extend the new principle to all penicillins continues at Beecham's laboratories.

The Doctor's Library

(Continued from page 57)

presented. The experienced clinician needs no such guide, but most of the readers of this text will belong to the former group. Unfortunately, the editor chose to list contributors en masse on a single page at the beginning of the book rather than to allow each contributor to be identified with the chapter which he prepared.

This deficiency might have been overcome by a strong editorial hand, but even here strength is lacking. For instance, we read: "The amount of carbon dioxide . . . gives a value known as oxygen saturation" (page 26) or that "Carbon dioxide blow off causes hypercapnia" (page 11), or we fail to read about rebreathing techniques for measuring carbon dioxide in the discussion of clincial measurement of carbon dioxide. We are restricted to a seven line discussion of pH in a chapter which included "Blood Gas Analysis" as part of its title.

The strength of the book lies in its variety. Pacemakers, electrolyte changes in banked blood, depigmentation of skin by chemicals impregnated in anesthetic rubber, body surface area, beta adrenergic blockers, tracheal collapse after thyroidectomy—and many more fascinating subjects are presented to stir the interest of the developing clinician.

This book must be recommended with reservation. It does make good supplementary reading for the clinician who has acquired his basic background from other sources.

Edward A. Brunner, M.D., PH.D.

Candidates for Mediatric

Commonly heard complaints from your geriatric patients may indicate an underlying disorder that may require immediate attention—and definitive therapy. But, with or without an underlying functional illness, the patients' physical and emotional well-being may be enhanced by adjunctive steroid-nutritional therapy. That's why so many patients just like these are suitable candidates for MEDIATRIC from their very first visit.

"A steroid-nutritional compound (Mediatric) was used in 100 patients to relieve some of the symptoms caused by degenerative changes of aging.... This therapy resulted in improvement of 75 per cent of the patients...."

McNeill, A. J.: Clin. Med. 8:518 (Mar.) 1961.

The estrogen content is PREMARIN® (conjugated estrogens—equine), the orally active, natural estrogen most widely prescribed for its superior physiologic and metabolic benefits. The combination of estrogen and methyltestosterone can help maintain an anabolic balance to forestall premature deteriorative changes of aging.

MEDIATRIC also supplies a small amount of methamphetamine to provide a gentle mood uplift; and nutritional supplements specially selected to meet the needs of the aging.

MEDIATRIC helps keep the older patients alert and active; helps relieve general malaise, easy fatigability, vague pains in the bones and joints, and lack of interest so often associated with declining gonadal hormone secretion.

CONTRAINDICATION: Carcinoma of the prostate, due to methyltestosterone component.

WARNING: Some patients with pernicious anemia may not respond to treatment with the Tablets or Capsules, nor is cessation of response predictable. Periodic examinations and laboratory studies of pernicious anemia patients are essential and recommended.

SIDE EFFECTS: In addition to withdrawal

bleeding, breast tenderness or hirsutism may occur.

SUGGESTED DOSAGES: Male and female: 1 Tablet or Capsule, or 3 teaspoonfuls Liquid, daily or as required.

In the female: To avoid continuous stimulation of breast and uterus, cyclic therapy is recommended (3 week regimen with 1 week rest period-Withdrawal bleeding may occur during this 1 week rest period).

In the male: A careful check should be made on the status of the prostate gland when therapy is given for protracted intervals.

SUPPLIED: No. 752 - MEDIATRIC Tablets, in bottles of 100 and 1,000.

No. 252 - MEDIATRIC Capsules, in bottles of 30, 100, and 1,000.

No. 910 - MEDIATRIC Liquid, in bottles of 16 fluidounces and 1 gallon.

Ctanaid mythitianal agminaged	Each MEDIATRIC	Each 15 cc.
		(3 teaspoonfuls)
Steroid-nutritional compound	TABLET or	of MEDIATRIC
1	CAPSULE	LIOUID
	contains:	contains:
Conjugated estrogens—equine (PREMARIN®)	0.25 mg.	0.25 mg.
Methyltestosterone	2.5 mg.	2.5 mg.
Methamphetamine HCl	1.0 mg.	1.0 mg.
Cyanocobalamin	2.5 mcg.	1.5 mcg.
Intrinsic factor concentrate	8.0 mg.	_
Thiamine HCl	_	5.0 mg.
Thiamine mononitrate	10.0 mg.	_
Riboflavin	5.0 mg.	_
Niacinamide	50.0 mg.	_
Pyridoxine HCl	3.0 mg.	_
Calcium pantothenate	20.0 mg.	_
Ferrous sulfate exsiccated	30.0 mg.	-
Ascorbic acid	100.0 mg.	_
		(Contains
		15% alcohol)





mudrane

for

- EMPHYSEMA
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS



Each tablet contains:

Potassium Iodide
Aminophylline130 mg.
Phenobarbital, Caution: May be habit forming 21 mg.
Ephedrine HCl

FEDERAL LAW PROHIBITS DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

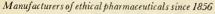
One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG—Formula, dosage and package identical to Mudrane—except—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC. RICHMOND, VIRGINIA 23217





NEW PHARMACEUTICAL SPECIALTIES

by Paul deHaen

NEW SINGLE CHEMICALS

CLOMID Fertility agent, non-hormonal Is Manufacturer: The Wm. S. Merrell Company Nonproprietary Name: Clomiphene citrate Indications: Treatment of ovulatory failure in patients desiring pregnancy, when ovulatory dysfunction is demonstrated. Clinical evaluation of liver function should always precede Clomid therapy. Ineffectual in patients in whom primary pituitary or ovarian failure precludes the possibility of stimulating normal function.

Contraindications: Pregnancy, liver disease or history of liver dysfunction, abnormal bleeding

of undetermined origin.

Dosage: 50 mg. daily for 5 days, beginning on or about the fifth cycle day. If ovulation does not occur, dosage can be increased to 100 mg. daily for 5 days. Not more than 3 courses of the rapy should be given

therapy should be given.

Supplied: Tablets—50 mg.; cartons of 30.

VONTROL Antinauseant

Manufacturer: Smith Kline & French
Nonproprietary Name: Diphenidol
Indications: Vertigo, nausea and vomiting
Contraindications: Anuria, known hypersensitivity to the drug.
Dosage: Adults—50 mg. q.4h. as needed.

Dosage: Adults—50 mg. q.4h. as needed. Children (for nausea and vomiting only)— 0.4 mg./1b rectally, not to exceed 2.5 mg./1b. in 24 hours,

Supplied: Suppositories—25 and 50 mg.; boxes of 6.

VONTROL (HC1) Antinauseant

Manufacturer: Smith Kline & French
Nonproprietary Name: Diphenidol HC1
Indications: Vertigo, nausea and vomiting.
Contraindications: Anuria, known hypersensitivity to the drug.

Dosage: Adults—25 mg. q.4h. as needed.

Dosage: Adults—25 mg. q.4h. as needed. Children (for nausea and vomiting only)— 0.4 mg./lb. orally, not to exceed 2.5 mg./lb. in 24 hours.

Supplied: Tablets-25 mg.; bottles of 100.

VONTROL (Pamoate) Antinauseant I3
Manufacturer: Smith Kline & French
Nonproprietary Name: Diphenidol pamoate
Indications: Nausea and vomiting.
Contraindications: Anuria, known hypersensitivity to the drug.

Dosage: Children—0.4 mg./1b. orally, not to exceed 2.5 mg./1b. in 24 hours.

Supplied: Suspension—20 mg./5 cc.; bottles of 4 oz.

(Continued from page 99)

Athletic Injury Clinic Aug. 5 in Champaign

The University of Illinois Athletic Association, in cooperation with the Illinois High School Coaches Association and the Illinois State Medical Society, will present its third annual Athletic Injury Clinic Aug. 5 in the West Great Hall of Memorial Stadium in Champaign. Registration is free for athletic directors, coaches, trainers, physicians, therapists and student trainers.

New Pharmaceutical Spec.

(Continued from page 88)

DUPLICATE SINGLE PRODUCTS

QUESTRAN Sequestering agent \mathbf{R} Manufacturer: Mead Johnson Nonproprietary Name: Cholestyramine Indications: Relief of pruritus associated with partial biliary obstruction. Contraindications: Complete biliary obstruction. Dosage: Adults and children over 6 years—4 Gm. t.i.d. with liquids before meals, to be adjusted as necessary, not to exceed 24 Gm. Supplied: Packets-4 Gm.; cartons of 50. PARGEL Antidiarrheal o-t-c Manufacturer: Parke, Davis & Co. Composition: Each ounce contains: Kaolin 6 Gm. Pectin 130 mg. Indications: Diarrhea Contraindications: None mentioned Dosage: As indicated Supplied: Plastic bottles—6 and 10 oz. Glass bottle—16 oz.

NEW DOSAGE FORMS

ILOSONE LIQUID 125 Antibiotic-B & M \mathbf{R} spectrum Manufacturer: Eli Lilly & Co. Nonproprietary Name: Erythromycin estolate Indications: Infections susceptible to erythro-Contraindications: Liver disease or dysfunction, known hypersensitivity to the drug.

Dosage: Same as for other oral Ilosone preparations. Supplied: Oral Suspension-125 mg./5 cc.; containers 60 cc., 1 pint.

VONTROL (HC1) Antinauseant Manufacturer: Smith Kline & French Nonproprietary Name: Diphenidol HC1 Indications: Vertigo, nausea and vomiting. Contraindications: Anuria, known hypersensitivity to the drug.

Dosage: Adults—1 to 2 cc. i.m., or 1 cc. i.v., if

symptoms persist 1 cc. may be added by either route after one hour. Thereafter i.v. route should not be used, and medication can be continued i.m. 1 to 2 cc. q.4h. as needed. Children (for nausea and vomiting only)-

0.2 mg./1b. i.m., not to exceed 1.5 mg./1b. in 24 hours

Supplied: Ampuls, 2 cc.—20 mg./cc.; boxes of 6 and 100. Multiple-dose Vials, 10 cc.—20 mg./cc.; boxes

of 1 and 20.

The program will include lectures, movies, demonstrations and discussions on prevention, treatment and rehabilitation of athletic injuries. Medical aspects of all sports will be covered by a faculty of physicians, dentists, trainers and therapists directly concerned with high school and college athletics.

The faculty includes Robert Behnke, head trainer, Illinois State University, Normal; H. J. Blackwell, USAF Red., assistant trainer, University of Illinois, Urbana; James C. Descourouez, head trainer and instructor in physical education at the University of Illinois, Chicago Circle; Ray Eliot, assistant director of athletics and former head football coach. University of Illinois, Urbana; W. W. Fulterton, M.D., physician and surgeon, Sparta; Robert C. Hamilton, M.D., orthopedic surgeon and team physician for DePaul University and Academy and University of Illinois, Chicago Circle; Norman James, D.D.S., Urbana; Daniel McCaskill, M.D., Champaign, neurosurgeon; Robert J. Moore, formerly assistant trainer for the Detroit Lions and now at the University of Illinois, Urbana; Robert L. Nicolette, head trainer, University of Illinois, Urbana; Joseph E. Powell, M.D., team physician, Western Illinois University, Macomb; Richard Sampson, D.D.S., Champaign; Paul Schaede and Carl Rose, University of Illinois equipment room, Urbana; L. M. T. Stillwell, M.D., University of Illinois team physician, Urbana, and Gene Vance, University of Illinois athletic director.

Anti-Obesity

(Continued from page 47)

the principles of surface psychotherapy cannot be practiced by remote control. The obese patient needs regimentation of caloric habits as well as in other areas; absolute control of certain supportive medication eliminates the danger of drug habitprevalent in immature obese people by employing look-alike prescriptions of varying dosages and matching placebos.





Tissue's healing nicely. Yet anxiety slows his steps toward recovery.

By helping overcome anxiety and tension which can thwart the convalescent's progress, Equanic (meprobamate) often may play an important role in medical and surgical aftercare.

Cautions: Carefully supervise dose and amounts prescribed, especially for patients prone to overdose themselves. Excessive prolonged use may result in dependence or habituation in susceptible persons as ex-addicts, alcoholics, severe psychoneurotics. After prolonged high dosage, drug should be withdrawn gradually to avoid possibly severe withdrawal reactions including epileptiform seizures. Side effects include drowsiness and, rarely, allergic or idiosyncratic reactions. These reactions, sometimes severe, can develop in patients receiving only 1 to 4 doses who have had no previous contact with meprobamate. Mild reactions are characterized by urticarial or erythematous maculopapular rash. Acute non-thrombocytopenic purpura with petechiae, ecchymoses, peripheral edema and fever have been reported. If an allergic reaction occurs, meprobamate should be stopped and not reinstituted. Severe reactions, observed very rarely, include angioneurotic edema, bronchial spasms, fever, fainting spells, hypotensive crises (1 fatal case), anaphylaxis, stomatitis and proctitis (1 case) and hyperthermia. Warn patients of possible reduced alcohol tolerance. Should drowsiness, ataxia, or visual disturbances occur, dose should be reduced. If symptoms persist, patients should not operate vehicles or dangerous machinery. A few cases of leucopenia, usually transient, have been reported following prolonged dosage. Other blood dyscrasias-aplastic anemia (1 fatal case), thrombocytopenic purpura, agranulocytosis and hemolytic anemia-have occurred rarely, almost always in the presence of known toxic agents. One fatal case of bullous dermatitis following intermittent use of meprobamate with prednisolone has been reported. Prescribe very cautiously for patients with suicidal tendencies. Suicidal attempts should be treated with immediate gastric lavage and appropriate supportive therapy. Contraindications: History of sensitivity to meprobamate.

Composition: Tablets, 200 mg. and 400 mg. meprobamate. Coated Tablets, WYSEALS® EQUANIL (meprobamate) 400 mg. Continuous-Release Capsules, EQUANIL L-A (meprobamate) 400 mg.

Wyeth Laboratories Philadelphia, Pa.



L'quanil (meprobamate) Wyeth

SOCIO ECONOMIC news

A service of the Public Relations and Economics Division

Sponsor Tables
Measure Banning
Corporate Medicine

A bill which would have prohibited the corporate practice of medicine in Illinois was tabled by its sponsor—Sen. Everett E. Laughlin (R-Freeport)—with the approval of the Illinois State Medical Society. Senator Laughlin said he tabled the bill to save legislators from "the task of voting on a complex issue which would require a great deal of time" at such a late date in the General Assembly's session. He extended an invitation to the Illinois Hospital Association to meet with ISMS representatives so that hospitals and doctors can "begin to work out their differences." If a solution is not found, Senator Laughlin said, "this bill will be back in the next session."

IDPA Changes Requirements On Medicare Patient Claims Doctors no longer need obtain a monthly assignment of benefits from public aid patients who also are eligible for Medicare benefits. The Illinois Department of Public Aid has collected assignment of benefit authorizations from all public aid recipients and has notified Blue Cross and Continental Casualty Co. that the patients' signatures on each claim form is no longer necessary. Physicians, in preparing their monthly statement for these patients, should indicate "public aid" in the space provided for the patient's signature, and should be certain they have listed the patient's complete public aid case identification number.

Consultant Outlines Stock Market Growth Areas What areas in the stock market offer the most dynamic promise of growth? David R. Sargent, president of United Business Service of Boston, suggested the following in an address before the 1967 annual meeting of the Iowa Medical Society: drug and medical supply industry, computers and office equipment, textbook publishers, firms engaged in the war against air and water pollution, and firms manufacturing equipment for leisure time activities. Sargent suggested, however, that stocks of companies in these areas not be bought after they have been moving up rapidly, when they are at the top of a general wave of popularity. All stocks, he noted, have their sinking spells that let the average investor buy at "rather reasonable" levels.

Tax Break for Physicians Sought in Senate Bill

Physicians who have formed professional service corporations or associations would be provided a tax savings opportunity under a bill introduced in Congress by Senators George Smathers and Spesser Holland of Florida. The bill would require the Internal Revenue Service to treat such corporations and associations as corporations for federal income tax purposes. Senator Smathers noted that 34 states have enacted laws to permit professional groups to incorporate, but that IRS has ignored these state laws and has continued to deny corporation treatment to professional groups organized under them.

Hospital Expenses Top \$1 Billion in March

Expenses incurred by hospitals in providing both inpatient and outpatient care exceeded the \$1 billion-a-month mark for the first time last March, according to the American Hospital Association. Expenses in March were \$1.03 billion, which represented a 20.3 percent increase over March 1966, data from a sample of 628 hospitals showed. Total expense per patient day increased to \$54.05, or a 15.8 percent increase over the previous March. Payroll expense, which accounts for nearly two-thirds of all hospital expenses, reached a high of \$33.40—or an 18.8 percent increase over March 1966.

ISMS Opposes Paying MDs For Utilization Review

Physicians serving on utilization review committees should not be reimbursed for that service, according to the ISMS House of Delegates. A report in this column in the June issue of the *Illinois Medical Journal* stated incorrectly that the House—at its annual meeting in May—had approved a resolution that such reimbursement should be at the individual option of the hospital staff and that ISMS be on record as "not objecting" to the practice.

-GAYLEN LAIR AND MARVIN SCHRODER

Chicago Dermatologist Discovers Toxic Agent Causing Fungus

Discovery of the toxic agent responsible for a human fungus disease prevalent in tropical countries was reported recently by John W. Rippon, assistant professor of dermatology at The University of Chicago.

The toxic agent was found to be an enzyme called "collagenase," which destroys the protein collagen, a structural material of bone and tissue, Rippon said.

His findings indicate that the fungus produces the enzyme, which then causes the severe bone and tissue damage found in humans infected with the fungus.

The fungus, Streptomyces maduras,

causes the disease known as maduramycosis or "Madura foot."

Spores of the fungus usually enter the body through a wound in the foot and infection slowly spreads up the leg. The disease is difficult to combat, and in many cases amputation is necessary.

Maduramycosis is common in parts of Africa and Asia. Cases are occasionally found in the southern United States and in South and Central America.

Rippon's report is believed to be the first in which a specific enzyme has been definitely shown to be responsible for the toxic effects of a microorganism.

THE VIEW BOX-

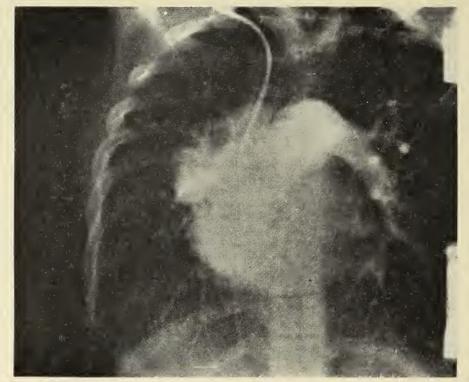


Fig. 2



Fig. 3

THE VIEW BOX

DIAGNOSIS AND DISCUSSION

(Continued from page 54)

By Leon Love, M.D.

Director, Department of Diagnostic Radiology, Cook County Hospital, and Associate Professor of Radiology, Chicago Medical School

DIAGNOSIS:

Anomalous venous drainage and hypoplasia of the right lung. (Scimitar Syndrome)

The "scimitar syndrome" involves the right lung and its vascular supply. It consists of hypoplasia of the right pulmonary artery and right lung with consequent dextroposition of the heart. There may be anomalous arterial supply of the right lower lobe by a systemic artery from the abdominal aorta, and anomalous venous drainage of the right lung. The anomalous vein has a characteristic scimitar-like shape and enters the inferior vena cava at the level of the diaphragm.¹

On the PA chest film the obvious findings are a decrease in the volume of the right hemithorax as indicated by a shift of the heart and trachea to the right side. If you overlap Fig. 3 on Fig. 1 the faintly outlined vascular structure on the PA chest (scimitar shaped) is seen to be a large anomalous vein which runs downward to the level of the diaphragm rather than medially to the left atrium as the corresponding left pulmonary vein does in a normal fashion. The presence of increased oxygen saturation on catheterization of the inferior vena cava at the level of the shunt confirmed the diagnosis.

In view of the relative lack of symptoms the patient is being observed.

References

"Radiographic Features of the Scimitar Syndrome" by John O.F. Roehm, Jr., Kenneth L. Jue, Kurt Amplatz in Radiology 86:858 (May 1966).

Che ISPITA

HOSPITAL OF CHOICE

North Shore Hospital, a 65-year-old psychiatric facility located on Lake Michigan in Winnetka, Illinois, is an intensive care hospital.

An open staff institution, it provides, through its house and attending staff, a total range of psychotherapies and those related activities which round out a comprehensive treatment program.

A new Half Way Hall, situated in the hospital, has been opened to provide relative freedom of movement in an environment designed to stimulate recovery and provide a necessary phase of interim residence.

A completely open section is a feature of North Shore Hospital's residential plan.

An adolescent program offers boys and girls of high school age a closelystructured program of daily care, with daily classroom attendance and individual tutoring emphasized.

The adjunctive therapies are manned by certified personnel. Occupational and recreational activities not only help structure the patient's day, but offer creative programs in which patients participate according to their emotional health and native capacity.

A therapeutic education program has been introduced for all patients. Medicare patients are offered special attention and remotivation activities.

Psychiatric testing and evaluation is offered, as is individual and group therapy, chemotherapy and the traditional modalities employed in the treatment of emotional illness.

In reputation, performance and location, North Shore Hospital is the psychiatric hospital of choice.



For information, contact:
CHARLES H. JONES, M.D.
Superintendent & Psychiatrist in Chief
Telephone: 312—446-8440
225 Sheridan Road, Winnetka, Illinois
(Write for Brochure)

Clinics for Crippled Children

Twenty-one clinics for Illinois' physically handicapped children have been scheduled for August by the University of Illinois, Division of Services for Crippled Children. The division will conduct 14 general clinics providing diagnostic orthopedic, pediatric, speech and hearing examination along with medical social, and nursing service. There will be six special clinics for children with cardiac conditions and rheumatic fever, and one for children with cerebral palsy. Clinicians are selected from among private physicians who are certified Board members. Any private physician may refer to or bring to a convenient clinic any child or children for whom he may want examination or consultative services.

Aug. 2, Alton Rheumatic Fever & Cardiac— Alton Memorial Hospital

Aug. 2, Carlinville—Carlinville Area Hos-

Aug. 2, Hinsdale—Hinsdale Sanitarium Aug. 3, Lake County Cardiac-Victory Memorial Hospital

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Starting Dates-1967

SPECIALTY REVIEW COURSE IN SURGERY, Part I, August 14 SPECIALTY REVIEW COURSE IN MEDICINE, Part I, Sept. 11 & 25 SPECIALTY REVIEW COURSE IN THORACIC SURGERY, Sept.

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PROCTOSCOPY & VARICOSE VEINS, One Week, July 17,

August 14

PRINCIPLES OF OPERATIVE SURGERY, Two Weeks, July 24

SURGERY OF THE HAND, One Week, September 18

SURGERY OF THE STOMACH, One Week, September 18

SURGERY OF FACE, MOUTH & NECK, One Week, September 18

VAGINAL APPROACH TO PELVIC SURGERY, One Week, September 18

AUGHNAL APPROACH TO PELVIC SURGERY, One Week, September 18

AUVANCES IN GYNECOLOGY & OBSTETRICS, One Week, September 25

SPECIALTY REVIEW COURSE IN OB—GYN, October 16

BASIC ELECTROCARDIOGRAPHY, One Week, October 9

ADVANCES IN PEDIATRICS, One Week, September 25

PEDIATRIC SURGERY, One Week, September 25

DIAGNOSTIC RADIOLOGY, One Week, September 25

DIAGNOSTIC RADIOLOGY, One Week, September 18

ANESTHESIA, Inhalation, Endotracheal, Regional, Request Dates

Information concerning numerous other continuation courses available upon request.

> TEACHING FACULTY Attending Staff of Cook County Hospital

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REGISTRAR, 707 South Wood Street, Chicago, Illinois 60612

Aug. 8, East St. Louis—St. Mary's Hospital Aug. 8, Peoria General—Children's Hospital Aug. 9, Champaign-Urbana-McKinley

Hospital

Aug. 10, Springfield General-St. John's Hospital

Aug. 11, Chicago Heights Cardiac-St. James Hospital

Aug. 11, Evanston-St. Francis Hospital

Aug. 15, Belleville-St. Elizabeth's Hospital Aug. 16, Chicago Heights General-St. James Hospital

Aug. 17, Bloomington-St. Joseph's Hospital

Aug. 17, Rockford-Rockford Memorial Hospital

Aug. 17, Elmhurst Cardiac-Memorial Hospital of DuPage County

Aug 22, Peoria General-Children's Hospital

Aug. 23, Springfield Cerebral Palsy (P.M.) -Diocesan Center, St. Paul's Cathedral 815 S. 2nd

Aug 23, Aurora—Copley Memorial Hospital Aug. 24, Effingham Rheumatic Fever & Cardiac-St. Anthony Memorial Hospital Aug. 25, Chicago Heights Cardiac-St. James Hospital

Aug. 29, East St. Louis-St. Mary's Hospital The Division of Services for Crippled Children is the official state agency established to provide medical, surgical, corrective, and other services and facilities for diagnosis, hospitalization and after-care for children with crippling conditions or who are suffering from conditions that may lead to crippling.

In carrying on its program, the division works cooperatively with local medical societies, hospitals, the Illinois Children's Hospital-School, civic and fraternal clubs, visiting nurse association, local social and welfare agencies, local chapters of the national foundation and other interested groups. In all cases, the work of the Division is intended to extend and supplement, not supplant activities of other agencies, either public or private, state or local, carried on in behalf of crippled children.





ILLINOIS MEDICAL ASSISTANTS ASSOCIATION REPORT



By JEAN H. BERSCHINSKI

"Progress Promotes Growth"—the theme of the 11th annual meeting of the Illinois Medical Assistants Association attended by 167 girls who registered for the whole meeting at the Conrad Hilton Hotel in Chicago and by a few more who were there on a part-time schedule.

The election of officers during the House of Delegates meeting gave us the following slate for 1967-68.

President

Mrs. Synobia Payne, Cook County President-Elect

Mrs. Helen Smith, McHenry County lst Vice President

Mrs. Zelma Bechtol, Lake County 2nd Vice President

Mrs. Anne Newingham, Peoria County Recording Secretary

Miss Phyllis Bredthauer, Kane Caunty Corresponding Secretary

Mrs. Vivian Johnson, Cook County Treasurer

Mrs. Luella Mitchell, Cook County The House of Delegates was opened with a welcome from Dr. Warren Young, president of the Chicago Medical Society, and following that the business meeting took place for the general assembly.

A panel on "Rx Factors for County Chapters" was held and there were many helpful hints directed toward public relations, grooming of officers, and guidelines for treasurers. The panel and discussion was aimed to help in understanding the correlation of local, state and national levels in our organization patterned after the medical societies.

The Presidents' Luncheon honoring county presidents, featured Ronald Vanderner, of the Chicago Police Department, who had a very colorful setting in which to talk to us on self defense and alertness in our everyday lives. He is an expert on judo and karate.

To serve our doctor employers better is our aim and some of the members put on a timely skit on "Office Management—This Can't Be Right." It was funny, but the mistakes were there for us to observe and ponder about. Dr. Thomas Harwood, of Highland Park, acted as moderator for a panel of experts who gave us the correct way so that these errors never occur in our offices.

Dr. Philip Thomsen, president-elect of ISMS, talked on our role in politics. There were so many interesting and informative facets brought out in his talk that we felt much better informed when he finished.

At the banquet, we were honored to have Mrs. Elvera Fischer, national president as our mistress of ceremonies. Monsignor James V. Moscow, associated with Catholic Hospitals, talked to us on "Honesty, Humor, Humility—Virtues for Squares?" Everyone enjoyed having Monsignor Moscow there.

The Illinois Medical Assistants feel satisfied that they have had a rewarding year and an excellent annual meeting to close it. Our wish is that each doctor reading this message will encourage his "Assistant" to be with us next year.

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FDA Points Out Dangers Of Tear Gas Guns

Serious injuries have occurred recently from the accidental discharge of tear gas guns, according to a warning from the Food and Drug Administration to the Illinois

Department of Public Health.

The FDA said that the public should be aware of the potential hazard of such devices, which are sold commonly throughout the nation. Many of the devices, sold as a means to fend off attackers, are not adequately labeled with information concerning their explosion potential.

The guns generally are cylindrical, hollow, pen-shaped objects about four inches long. At one end there is a 20-coil spring and a sliding piece of stainless steel similiar to the bolt of a rifle. At the other end

there is a space for the cartridge.

A few of the serious accidental injuries reported to the FDA recently concerned a Minnesota doctor who picked up what he thought was a spray dispenser and discharged a tear gas cartridge into his hand . . . a Washington, D. C., secretary, also shot in the hand when she triggered the firing mechanism of what she thought was a mechanical pencil . . . a Missouri boy who reportedly lost the vision in one eye from the shot of what he thought was a miniature flash light.

At present, it is illegal in Illinois to carry on or about the person or in any vehicle, such tear gas devices. However, Dr. Franklin D. Yoder, Director of the Illinois De-

The Illinois Senate on June 22 refused to pass a House bill permitting women to carry tear gas weapons. Opponents charged that the weapons could be used for criminal purposes.

partment of Public Health, said state legislation is pending to legalize the possession and use of these devices by females 17

years of age or older.

Should this proposed legislation become law, the Hazardous Substances Labeling Act, administered by The Health Department, would apply to such devices in Illinois. They would have to be plainly labeled to comply with the federal law "Warningirritant-explosive charge-tear gas-carefully read instructions before loading device –keep away from children."

Usual and Customary Fees

(Continued from page 82)

Must a doctor sign a "Participating Physician" agreement under this program?

A. No.

Will Blue Shield provide special claims forms for patients covered under a usual and customary program?

A. There will be no special forms—in fact, a fringe benefit of this program is that we anticipate there will be less paper work in the filing of claims. We will use the regular Physician Service Reports. I might add, however, that doctors should be certain that they list charges for each service they perform.

Q. Dr. Sweeney, what-in your opinion—will be the result of usual and

customary fee contracts?

A. I think they will accomplish two long-desired goals-a greater return for physicians from third party agencies . . . and a greater return to the public in benefits provided.

Professional Ethics

(Continued from page 18)

RIGHTS-RIGHT DUTY OF COUNTY AND STATE MEDICAL SOCIETIES. The American Medical Association is unalterably opposed to the denial of membership privileges and responsibilities in county medical societies and state medical associations to any duly licensed physician because of race, color, religion, ethnic affiliation, or national origin;

> The American Medical Association calls upon all state medical associations, all component societies, and all individual members of the American Medical Association to exert every effort to end every instance in which such equal rights, privileges, or responsibilities are denied. (House of Dele-

gates, 1964.)

11. DISPUTES BETWEEN PHYSICIANS. Whenever there arises between physicians a grave difference of opinion, or of interest, which cannot be promptly adjusted, the dispute should be referred for arbitration, preferably to an official body of a component society. (Principles of Medical Ethics, 1955 edition, Chapter VI, Section 9.)

OBITUARIES

- *Dr. George Abelio, died May 25 at the age of 78 in Clearwater, Fla. He had been associated with Grant Hospital, Chicago, a member of the American College of Surgeons and a member of the ISMS Fifty-Year Club.
- *Dr. Alex W. Adelman, Chicago, died May 25 at the age of 60. He was a physician in Chicago for 35 years, the last few years at the 5th Army Headquarters. He was also a Mason and a member of Medinah Temple in Chicago.
- *Dr. George D. Kaiser, Oak Park, died June 16 at the age of 56. He was assistant chief of surgical services at Hines Veterans Hospital and associate professor of surgery at the Stritch School of Medicine at Loyola University.
- *Dr. Harley E. Kimble, died May 27 at the age of 67. He had been a physician for 45 years in Chicago and was a veteran of both world wars.
- **Dr. Wilfred A. Malone**, died June 15 at the age of 63. He was the first chief of staff of the Little Company of Mary Hospital in Evergreen Park.
- **Dr. Wilbur J. McNee,** Dixon, died May 17 at the age of 54.
- *Dr. William N. Meyer, died June 6 at the age of 46. He was a graduate of Loyola University Medical School.
- *Dr. John B. O'Donoghue, Lake Forest, died June 1 at the age of 71. He was on the faculties of Loyola University School of Medicine and the Cook County Hospital Graduate School. A member of the hospital advisory board of the Illinois Department of Public Health, he was a past president of the

- U.S. section of the International College of Surgeons, treasurer and a trustee of Hektoen Institute of Medical Research, and a member of the Hill-Burton Commission for the State of Illinois.
- *Dr. Harry Phillips, died June 7 at the age of 62 in Ladue, Mo. He was a member of the American Psychiatric Association, American Geriatric Association, and the Academy of Psychosomatics.
- *Dr. Milton Plafker, Wilmette, died May 9 at the age of 52 in Columbus Hospital, Chicago, where he had been a staff member for 25 years. He was on the staff of the Cook County Department of Health, affiliated with the Chicago Board of Health, and was a member of B'nai B'rith.
- *Dr. Glenn W. Putnam, died May 25 at the age of 83. He had practiced in Aurora since 1917.
- *Dr. Jaroslav Tetrev, Berwyn, died May 23 at the age of 63. A graduate of Rush Medical College in 1927, he served as a captain in the army medical corps in World War II.
- *Dr. Allan D. Welch, Barrington Hills, died May 30 at the age of 58. He had been a physician for 32 years and served on the staffs of Sherman and St. Joseph's Hospitals in Elgin.
- *Dr. J. Lewis Webb, died June 13 at the age of 83. He was on the staff of St. Elizabeth's and Henrotin Hospitals, Chicago. He once headed Henrotin's dermatology staff and also was a member of the ISMS Fifty-Year Club.

for July, 1967

^{*}Member of Illinois State Medical Society.



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for August, 1967



Illinois Medical Journal

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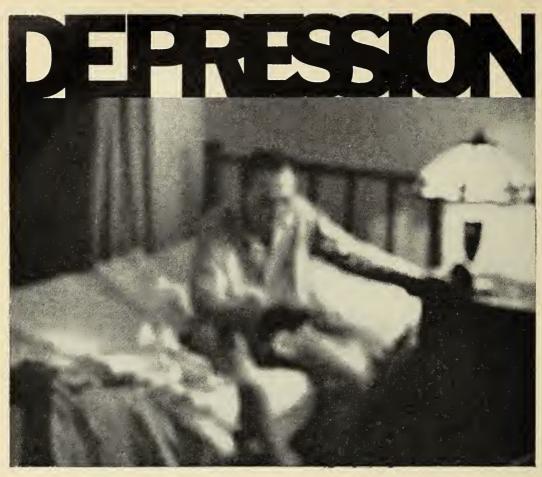
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contraindications: Glaucoma, urethral or ureteral spasm, recent myocardial infarction, severe coronary heart disease, epilepsy. Should not be given within two weeks of treatment with a monoamine oxidase inhibitor.

RELATIVE CONTRAINDICATIONS: (1) Patients with a history of paroxysmal tachycardia. (2) Patients receiving concomitant therapy with thyroid, anticholinergics or sympathomimetics may experience potentiation of effects of these drugs. (3) Safety in pregnancy has not been established.

PRECAUTIONS: (1) Outpatient use of desipramine hydrochloride should not be substituted for hospitalization when risk of suicide or homicide is considered grave. (2) If serious adverse effects oc-

cur, reduce dosage or alter treatment. (3) In patients with manic-depressive illness a hypomanic state may be induced. (4) Discontinue drug as soon as possible prior to elective surgery.

ADVERSE EFFECTS: Side effects, usually mild, may include: dry mouth, constipation, dizziness, palpitation, delayed urination, "bad taste," sensory illusion, tinnitus, anxiety, agitation and stimulation, insomnia, sweating, drowsiness, headache, orthostatic hypotension, flushing, nausea, cramps, weakness, blurred vision and mydriasis, rash, tremor, allergy, agranulocytosis, altered liver function, ataxia, and extrapyramidal signs.

DOSAGE: Optimal results are obtained at a dosage of 50 mg., t.id. (150 mg./day). SUPPLIED: NORPRAMIN (desipramine hydrochloride) tablets of 25 mg., bottles of 50, 500 and 1000; and tablets of 50 mg., in bottles of 30, 250 and 1000.

LAKESIDE LABORATORIES, INC., Milwaukee, Wisconsin 53201



The president's page



Newton DuPuy, M.D.

With the Illinois General Assembly having completed its work for another biennium, the state's legislators have returned to face the plaudits—or the pannings—of their constituents back home.

However, before the last hurrahs are sounded for those deeds done—or left undone—at Springfield, I want to sound my personal cheer for members of the ISMS Legislative Committee and the ISMS Division of Legislation and Public Affairs.

These individuals worked with unflinching dedication throughout the legislative session to win passage of those bills which ISMS believed to be beneficial to the people of Illinois. They worked with equal enthusiasm to help defeat legislation which the state society believed to be detrimental to the public and to the profession.

The success of their efforts is dramatically illustrated through a particularly controversial issue—the proposal to impose a tax upon physicians' services.

Had this proposal been accepted, the public would have been penalized for being ill and physicians—who sometimes feel they are already sinking under a sea of paperwork—would have been inundated.

ISMS opposed this tax and our representatives, working skillfully and persuasively behind the scenes, convinced legislators of the reasonableness of the society's position. As a result, physicians' services will not be taxed.

There were other accomplishments—passage of a rehabilitation program for nar-

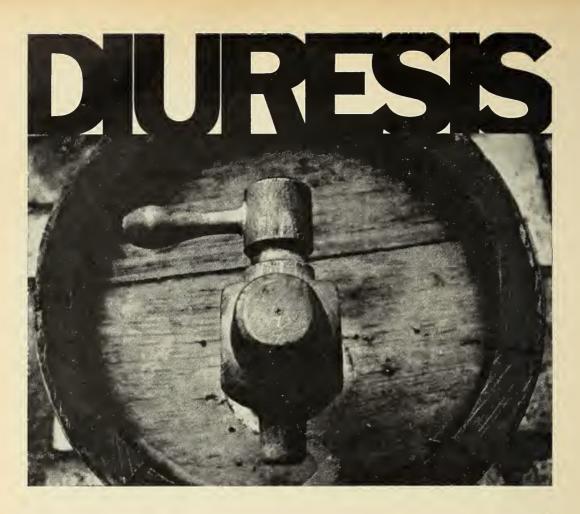
cotic addicts, for example. Our representatives threw ISMS support to the establishment of a Renal Advisory Committee and helped to win the appropriation of \$1 million with which to further renal dialysis programs. Several changes to improve enforcement of the Medical Practice Act were supported by our Legislative Committee-and were passed, including a new Division of Professional Supervision in the Department of Registration and Education. Legal immunity was secured for physicians who serve on hospital utilization committees. Numerous undesirable pieces of legislation were defeated as a result of our efforts.

This is but a sampling of the areas in which ISMS representatives were concerned in Springfield. In all, there were 75 bills introduced at the recent session which were of primary interest to the medical profession. There were another 150 which were of some medical significance and which were dissected, analyzed and followed closely by ISMS staff and committee members.

The volume of bills with medical implications can only continue to grow in the future, as more and more segments of society develop special interests in health care matters. This means, of course, an even greater task for those who serve the state medical society in Springfield.

However, here is where every ISMS member can make a contribution to assure that (Continued on page 192)

for August, 1967



MERCUHYDRIN (meralluride injection)



Twenty years ago the publication of "A System for the Routine Treatment of the Failing Heart" established a schedule of diuretic therapy as a primary factor in the treatment of acute congestive failure. With emphasis upon daily injections of Mercuhydrin (meralluride injection) until dry weight was obtained, Gold, et al. achieved a 40% increase in improvement, in ½ the time, over other methods then current. Today, most medical texts continue to recommend parenteral mercurials in acute congestive failure when prompt diuresis is indicated.

Recently Modell² has stated: "The mercurial diuretics are the injectable diuretics of choice since they are the most potent as well as the most dependable. Their toxicity is not an important consideration either by comparison with other potent diuretics or in relation to the seriousness of the conditions in which they provide such excellent relief."

IN BRIEF

Mercuhydrin is indicated in edema of cardiac or hepatic origin and in the nephrotic syndrome; it is contraindicated in acute nephritis and in anuric or oliguric states. The usual adult dose is one to two cc. daily or every other day until "dry weight" is obtained. Sensitivity is rare but small initial doses are advised to minimize potential reactions; vertigo, fever, and rash have occurred. Overdosage may produce electrolyte depletion, muscle cramps, and G.I. reactions. Supplied: 1 cc. and 2 cc. ampuls in boxes of 12, 25 and 100; 10 cc. rubber capped, multiple-dose vials (intramuscular or subcutaneous use only) in boxes of 6 and 100.

- 1. Gold, Harry, et al.: A System for the Routine Treatment of the Failing Heart, The American Journal of Medicine, Vol. III, No. 6:665-692 (Dec.) 1956.
- 2. Modell, Walter: *Drugs of Choice 1966-1967*, p. 97, 1966.

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Hyperthyroidism: Etiology and Treatment

By JEROME M. HERSHMAN, M.D. / CHICAGO

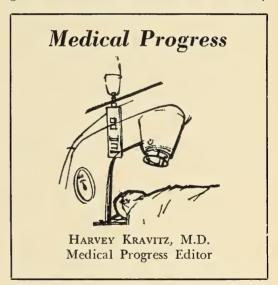
The cause of hyperthyroidism is almost as obscure today as it was 132 years ago when Robert Graves described the condition.1 Many etiologies have been proposed but none satisfactorily explain all the principal features: excessive thyroid hormone secretion with its attendant metabolic and pathologic features, exophthalmos, familial occurrence, and the preponderance of female patients. Recent studies indicate that the thyroid is driven to its excessive production by a circulating stimulator rather than being autonomous.2,3 This stimulator is found in the serum of patients with Graves' disease. In a bioassay, it has a longer duration of action than pituitary thyrotropin, giving rise to the name long-acting thyroid stimulator or LATS. It has not been found in patients with autonomous hyperfunctioning adenomas [Plummer's disease].4 The relationship of LATS to exophthalmos is still unclear, but it appears likely that this substance is responsible for the hyperthyroidism per se.

Chemically LATS is a Gamma G globulin; consequently it can be separated from thyrotropin by several means.⁵ It can be inactivated by thyroid tissue, particularly by thyroid microsomes.⁶ If LATS is the stimulator of the thyroid in Graves' disease and is also an antibody to thyroid tissue, what

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triggers its production? This problem remains unsolved.

In hyperthyroidism, the thyroidal clearance of iodide from the blood may be increased four to 10 times normal; yet the glandular stores of hormone are markedly



depleted to as little as one-tenth of the normal amount because of the rapid rate of secretion of hormone. The rate of degradation of thyroxine may be four to seven times the usual quantity of 100 micrograms per day.⁷ Laboratory diagnostic studies are based on measurements of: 1] the accumulation of iodine by the thyroid, 2] the circulating thyroid hormone, 3] peripheral metabolic effects of thyroid hormone, and have been reviewed recently.⁸

Treatment

In the absence of a known cause at which treatment can be rationally aimed, present modes of therapy are directed at control of the excessive production and secretion of thyroid hormone by either partial ablation of the thyroid with radioiodine or thyroidectomy or by reducing synthesis with the antithyroid drugs.

Thyroidectomy has been performed for the treatment of exophthalmic goiter since the late nineteenth century. The mortality was comparatively high until 1922, when Plummer demonstrated that treatment with iodine improved the symptoms and signs of hyperthyroidism and lowered the metabolic rate.9 Through the use of iodine for preoperative preparation of the patient, he significantly reduced the mortality of thyroidectomy and believed that iodine would even abolish postoperative thyroid storm. For the next 20 years, iodine followed by thyroidectomy was the main treatment. In 1943, Astwood published his first studies on the use of antithyroid drugs for this condition.10 Initally, they were used in patients who had relapsed after surgery or who did not respond to iodine or who were too ill for surgery. When it became apparent that antithyroid drugs completely controlled hyperthyroidism, they offered an effective alternative to surgery. In addition, they were used to render a patient euthyroid before surgery more effectively than did iodine. At about the same time, radioiodine became available and soon proved to be a useful therapeutic agent. The remainder of this discussion will be an analysis of these three methods of treatment: thyroidectomy, antithyroid drugs, and radioiodine.

Thyroidectomy

Were it not for the complications of surgery, thyroidectomy would be an efficacious treatment for hyperthyroidism. Many surgical series have been reported, but the lack of a uniform analysis of the results and the short period of postoperative follow-up limit the usefulness of these reports. Table 1 lists the incidence of various complications reported from the major surgical centers specializing in this form of treatment. In some of these reports, hyperthyroid patients with nodular goiter were not distinguished from euthyroid cases of nodular goiter; in these series, Table 1 lists

only those with "toxic diffuse goiter." In addition, patients with previous thyroidectomies were excluded because the incidence of complications is several times higher with repeated surgery.

In recent years, mortality has ranged from 0 to 1.2 per cent. Post operative hypothyroidism has been found in 3.6 to 42.5 per cent and was more frequent when the patients were followed by an internist. 11, 19 Nofal, Beierwaltes, and Patno recently reported that the cumulative incidence of hypothyroidism after surgical treatment rose 1.7 per cent per year after the first year, being 42.5 per cent in 10 years. 19 In one endocrine referral clinic, 29 per cent of the cases of myxedema had a previous thyroidectomy, and five years or longer had elapsed before myxedema was recognized in 38 per cent of them.20 Recurrence of hyperthyroidism varied from 0.6280 percent in adults and was as high as 17.9 per cent in children.12

Permanent hypoparathyroidism, a serious condition that requires daily medication and lifelong supervision by an experienced physician, has been reported in 0 to 3.6 per cent of patients. Fourman and his colleagues found that hypoparathyroidism occured in 24 to 28 per cent of patients who were carefully studied for parathyroid insufficiency after recovering from a thyroidectomy. ^{21, 22} Tetany, a transient but lifethreatening hypocalcemic syndrome sometimes dramatically initiated with a convulsion, occurred in 1.2 to 8.0 per cent of cases.

Permanent unilateral vocal cord paralysis resulted in up to 4.4 per cent of thyroidectomies; ¹⁶ in the same study, 30 per cent of patients with previously normal voice claimed to have an altered voice after recovery from the surgery. Problems of the wound, such as serious effusion and hematoma necessitating tracheostomy as well as cosmetic disfigurement from the scar, were usually not included in the reports but probably happened to a significant proportion of cases. With proper preoperative control of the hyperthyroidism, postoperative storm appears to have been eliminated.

Antithyroid Drugs

The antithyroid drugs which are thionamide derivatives interfere with the synthesis of thyroid hormone by blocking the organic binding of iodine and the subsequent steps in the synthesis of thyroxine,

Table 1.

Results of Surgery for Hyperthyroidism

Authors	Goldman	Hayles et al.	Bartels	Colcock and King	Asper	Painter	Green And Wilson	Reeve et al.
Reference Number	11	12	13	14	15	16	17	18
Years of Study	1935- 19 4 8	1908- 1956	1945- 1951	1956- 1959	1946- 1957	1947- 1956	1949- 1960	1956- 1962
Number of Patients	3791	1962	2400	2611	307	172	251	82
Mortality %	1.0	2.2^{3}	0.2	0	0	0.6	0.4	1.2
Hypothyroidism % Permanent Temporary	29.74	25 	5.2 1.3	17.2	4.0	10.8 4.8	5.1 	3.6
Recurrence or persistence %	3.6	17.9	2.0		2.0	0.6	8.0	1.2
Hypoparathyroidism Permanent % Tetany	1.5	1.0	0.7	0	2.8	3.6		2.4
(transient)%		••••	3.0	8.0	7.2	4.2	1.2	1.2
Vocal cord paralysis %	2.7	1.0	••••	0	1.9	4.4	1.2	0
Vocal Cord Paresis %	3.3	••••		0.8	1.6	5	5.0	4.8
Wound Problems %			••••	4.2	4.0	****	15.5	14.4
Keloids %	••••	3.6	••••	••••	••••	••••	4.0	****
Thyroid Storm %	1.5	•	••••	****	****	****	****	0
Length of Follow-up (yr.) Minimum	****	<1	Irreg- ular	1	••••	1.5	1	1
Mean	••••	10-30		1-3	••••	4.3	5-7	••••

¹ toxic diffuse goiter.

probably through inhibition of a peroxidase enzyme system.²³⁻²⁵ With the usual dose, the iodide trap is not blocked, but the iodide taken up rapidly leaves the thyroid gland because it is not incorporated into the hormone or its precursors. Hyperthyroid patients, because of their depleted hormonal stores and rapid turnover of thyroxine, are far more sensitive to the effects of antithyroid agents than are euthyroid patients.

The commonly used agents, propylthiouracil and methimazole [Tapazole ®], which is 10 to 20 times as potent,²⁶ are given in a starting daily dose of 300 mg and 15 to 30 mg respectively;²⁰ in very severe cases and in patients unusually insensitive to these agents, twice these amounts may be necessary. Because their dura-

tion of action is short, the daily dose should be divided and given at eighthour intervals. Greer *et al.* recently showed that initiation of treatment with a single daily dose of antithyroid drug was successful in controlling thyrotoxicosis in most patients.²⁷ Because two of 26 patients failed to respond to a single dose but did achieve remission when the same daily dose was given in equal portions at 8-hour intervals, the method of eight-hourly dosage still appears preferable.

With this program, hyperthyroidism can be controlled with only rare exceptions. Improvement occurs in two to three weeks and patients are usually asymptomatic in six to eight weeks. They may be seen at intervals of two to three months for ad-

² children.

³ all before 1934

⁴ followed by internists.

^{....} indicates not stated.
5 30% had altered voices.

justment of dosage based on the clinical response and the serum protein-bound iodine which falls to the normal range when a euthyroid state is achieved. When the disease is well controlled or if hypothyroidism occurs, the dose may be reduced by onehalf. Treatment is ordinarily contained for one year. Enlargement of the goiter is usually indicative of hypothroidism and is presumably caused by the secretion of thyrotropin in response to the hypothyroid state. This will subside with reduction of the dosage, or alternatively full dosage may be continued and 120 to 180 mg of desiccated thyroid prescribed in addition to suppress secretion of thyrotropin, a scheme which is also satisfactory for patients who cannot be followed regularly for adjustment of dosage. Rarely, enlargement of the goiter occurs with exacerbation of the disease which is obvious clinically and may be controlled with a larger dose of the antithyroid drug.

Astwood showed that antithyroid drugs were efficacious for hyperthyroidism in pregnancy and that their use was not associated with complications or fetal loss.28 If overdosage is avoided and the mother is maintained in a euthyroid state, goiter does not occur in the infant nor is there any suppression of fetal thyroid function. Combined treatment with antithyroid drugs and thyroid to prevent hypothyroidism and goiter in the newborn is a satisfactory alternative method of treatment, preferable when clinical evaluation of thyroid function is difficult.²⁹ Treatment can usually be stopped at the time of delivery, even though it has not been continued for 12 months, to permit nursing and to determine whether lasting remission has been achieved.

Skin rash is the most frequent type of hypersensitivity reaction and subsides when the drug is withdrawn. Usually, it does not reappear when the other antithyroid drug, methimazole or propylthiouracil, is substituted. Agranulocytosis may occur in one out of 250 to 500 patients;³⁰ when it appears, it comes rapidly and with characteristic symptoms. Patients with hyperthyroidism often have leukopenia, sometimes with white cell counts as low as 3,000, and a relative neutropenia. Routine counting of white cells may lead to needless alarm and interruption of therapy and is rarely of value in heralding agranulocytosis.³¹

"The major advantages of treatment with the antithyroid drugs are that no damage is done to the thyroid gland, no irreversible changes are induced, lasting myxedema does not occur, and hyperthyroidism can be corrected uniformly in a reasonably short time."³¹ The disadvantages are the high recurrence rate when treatment is stopped and the long period of treatment.

In a recent study of the results of treatment with antithyroid drugs in 176 patients whose therapy ended at least six years before the study, 54 per cent had remained well after discontinuing antithyroid drugs.³² In this group remission had continued for 10 to 20 years in three-fourths and for 6 to 10 years in one-fourth. Eighty-one patients [46 per cent] had experienced a relapse of hyperthyroidism. Seventy per cent of recurrences took place within one year after treatment and less than 3 per cent of patients had recurrences after a remission of six years.

A number of factors were studied in order to find a basis for separating in advance the patients who were likely to achieve a long-term remission from those likely to relapse. Reduction in the size of the goiter at the end of treatment was strongly indicative of a long-term remission. A duration of symptoms of less than one year before treatment was also correlated with a favorable outcome so that this history may be helpful in selecting the mode of therapy. However, many patients with hyperthyroidism that was recurrent or of a chronic nature sustained long-term remission after treatment with antithyroid drugs. The factors of age, sex, recurrent hyperthyroidism after surgery, size and type of goiter, whether diffuse or nodular, did not influence the eventual outcome.

Table 2 lists the results of other studies of treatment of hyperthyroidism with antithyroid drugs. The periods of observation are not uniform, but the studies having a minimum follow-up of four years after treatment show incidences of remission which vary from 45 to 70 per cent.

The thyroid suppression test performed at the completion of therapy may be useful to predict whether a patient will relapse. Patients with 24-hour radioiodine uptakes of less than 30 per cent after three weeks of 180 mg thyroid per day have a much higher incidence of remission than those with uptakes greater than 50 per cent.⁴² A significant number of patients who relapse after taking antithyroid drugs for one year

TABLE 2.

Summary of Previous Studies on the Long-Term Follow-up of Patients Treated with Antithyroid Drugs

Authors (ref. no.)	No. of Patients	Years Followed after Treatment	Incidence of Remission %
Solomon et al. (33)	101	4 or more	55 to 70
McCullagh and Cassidy (34)	60	4 to 6	66
Douglas and Kennie (35)	187	? to 5	45
Manson (36)	70	>1	71
Goodwin et al. (37)	94	1/ ₄ to 4	41
Aspenstrom (38)	120	>1	70
Trotter (39)	157	approx. 10	45
Willcox (40)	152	1 to 12	72
Reveno and Rosebaum (41)	167	4 to 19	57

obtain a long-term remission after an additional course of therapy.³³

Potassium perchlorate, which inhibits the iodide-trapping mechanism, effectively controlled hyperthyroidism, but its use has been generally abandoned because it caused fatal aplastic anemia in several cases. 43 Iodine inhibits the release of hormone from the hyperplastic goiter, thereby acting more quickly than other drugs.44 It reduces the vascularity and size of the thyroid and also inhibits hormonal synthesis in most patients for a variable period of time. If inhibition of synthesis does not occur, however, hormonal stores may be increased. Following withdrawal of iodine, the rapid release of hormone may produce an exacerbation of symptoms.44 Presently, iodine is recommended for two situations: first, to slow release in the severely thyrotoxic patient; its administration should be preceded by an antithyroid drug to inhibit synthesis; secondly, to reduce vascularity and size of the thyroid in preparation for surgery.

Reserpine and guanethidine, drugs which deplete tissue stores of catecholamines, have been used recently for the treatment of thyrotoxicosis. ^{45, 46} They may reduce the symptoms of the disease without altering thyroid function. In the large doses which have been recommended these drugs may also produce unpleasant side effects such as postural hypotension or diarrhea; they

should be regarded as adjunctive and not definitive therapy.

Radioiodine

Since the early 1940's, radioiodine has been used as a means of selectively placing destructive radiation within thyroid tissue for the treatment of hyperthyroidism. 131I has been used for the past 20 years in over 150,000 cases in the United States alone. It is now widely accepted as the preferred treatment for elderly patients, those with cardiovascular disease or other complicating illness, and patients with recurrent hyperthyroidism after thyroidectomy. Administration of the isotope is not unpleasant for the patient and does not produce any mortality, tetany, or vocal cord paralysis. Failures of treatment with 131 I are very rare and long-term recurrences are virtually unknown. When exacerbation of symptoms has been reported, it was probably caused by the unnecessary withdrawal of drug treatment or by withholding antithyroid drugs until the radiation took effect, usually a period of four to eight weeks. Radioiodine treatment is contraindicated in pregnancy because the fetal thyroid accumulates a significant amount after the third month.

The major drawback of the treatment is the induction of hypothyroidism in a large percentage of cases. As yet there is no method to select a dose that is uniformly

satisfactory. A quantity that may restore normal thyroid function in one patient may prove entirely ineffective in another or may even induce lasting myxedema in a seemingly similar case. Elaborate methods of calculating the dose based on estimates of thyroid size and measurements of iodine turnover have been no more satisfactory than arbitrary fixed doses. With conventional doses, approximately two-thirds of patients are rendered euthyroid by a single treatment and 90 per cent are cured by two, leaving a stubborn 10 per cent of cases who may require three to seven doses.47 Although this may prolong treatment to more than one year, the disease can be controlled by administering antithyroid drugs for a period of 6 to 8 weeks beginning 24 to 48 hours after giving the ¹³¹I. The effectiveness of the radioiodine may be assessed four to six weeks after stopping the antithyroid drugs. Complete or nearly complete disappearance of palpable thyroid tissue is a reliable index of effective therapy.

Hypothyroidism may occur within a few months and may be transient. If severely symptomatic, it can be treated and then treatment can be stopped after one year to assess whether or not it is permanent. Myxedema appearing one year after therapy is permanent. Earlier studies showed a five to 15 per cent incidence of permanent hypothyroidism. However, the incidence was higher in patients followed for a longer period of time. More recent studies show a 29 to 50 per cent incidence of hypothyroidism 10 years after radioiodine with an increase at the rate of 2 per cent per year. 17, 48 After the use of a somewhat larger dose of 131I, Nofal et al. found a 70 per cent incidence in 10 years with an increase at the rate of 2.8 per cent per year.19 Smith and Wilson recently reported that patients given one-half the conventional dose of ¹³¹I had only one-fourth the incidence of hypothyroidism of the conventionally treated patients [7.4 vs 29 per cent] in a five year follow-up.49 The initial control of hyperthyroidism by 131I alone was slower in the group receiving the lower dose and more of these patients were given antithyroid drugs, but after three years the percentage of euthyroid patients was similar in the two groups. In cases of hyperthyroidism due to a hyperfunctioning adenoma, large doses of 131I have been used without inducing myxedema because the non-adenomatous thyroid tissue is suppressed by the adenoma.⁵⁰

Sheline et al. found eight patients with thyroid nodules after ¹³¹I treatment of children of whom four were less than 10 years old at the time of therapy.⁵¹ One was called "low grade follicular carcinoma" and remains the only case of possible carcinoma of the thyroid attributable to ¹³¹I in the world's literature. The authors stated that nodules after ¹³¹I resemble those occasionally recurring after surgical subtotal thyroidectomy. To date, radioisotope treatment of hyperthyroidism has not been shown to be carcinogenic.

Pochin found 18 cases of leukemia in 60,000 patients treated with ¹³¹I;⁵² this was three less than the 21 expected to occur by chance in the population. He concluded that his study gave no support to the idea that the treatment of hyperthyroidism with ¹³¹I induces leukemia, but it did not exclude the induction. The use of ¹³¹I has been opposed because of its possible genetic effects. Cantolino *et al.* found chromosomal aberrations in the peripheral leukocytes of five hyperthyroid patients treated with ¹³¹I within the previous year,⁵³ but this observation requires additional study.⁵⁴

Selection of Treatment

For young people, pregnant women, and patients with a recent onset of hyperthyroidism, antithyroid drugs appear to offer the best result. The thyroid is left intact and no permanent consequences ensue from the treatment. Reduction in the size of the goiter with treatment heralds a good longterm result, but there are no uniformly successful prognostic factors. Radioiodine is indicated for treatment of hyperthyroidism in patients with a complicating medical illness for whom recurrence of hyperthyroidism is hazardous, for the elderly, for patients with recurrent hyperthyroidism after surgery, and for those who have relapsed after two successive courses of antithyroid drugs. Its administration is simple and the goiter disappears or diminishes in size, but the high incidence of hypothyroidism is undesirable, particularly in the young, because of the need for lifelong medication. Because of the complications of thyroidectomy, previously discussed in detail, medical modes of treatment are preferable.

SUMMARY

Present day treatment of hyperthyroidism is directed at reducing the excessive production of thyroid hormone. Because of the complications of thyroidectomy, namely, recurrence, hypothyroidism, hypoparathyroidism, vocal cord injury, problems of the wound, and surgical mortality, medical therapy is preferable.

Treatment with ¹³¹I is recommended for recurrent hyperthyroidism, older patients, and those with complicating illnesses for whom recurrence would be hazardous. With conventional doses, hypothroidism occurs in 30 to 70 per cent of cases followed for 10 years and its frequency may be even greater with a longer period of observation. Lower doses will probably reduce the incidence of hypothyroidism but may prolong therapy. Antithyroid drugs do not damage the thyroid or cause irreversible changes. They produce a long-term remission in approximately one-half the cases and are recommended for young people, pregnant women, and patients with a recent onset of hyperthyroidism.

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POLITICAL PSYCHIATRY: STRATEGY

The grand strategy of the War on Mental Illness is to convert medical problems into sociological ones by concentrating on environmental stress as a cause of illness. The sociological problems are then reinterpreted as political problems with social action in the form of voting as the ultimate force. (During elections the issue can be stated as being for or against illness.) The political psychiatrist sees the developing strategy; by judiciously riding the wave of social change he can control the mounting political force with a combination of technical authority, careful planning, political acumen, and, as always in war, a bit of luck. Ralph Crawshaw, M.D. Medical Opinion and Review (April) 1967.

IMPORTANT NOTICE RELATING TO SALE OF PAREGORIC

EFFECTIVE JULY 1, 1967 the sale of PAREGORIC and PAREGORIC PREPARATIONS, not exceeding TWO FLUID OUNCES of PAREGORIC can be made ONLY upon prescription of a physician or other practitioner. Pursuant to revised rule #6, under the UNIFORM NARCOTIC DRUG ACT, such preparations shall be "CLASS B" preparations and may be DISPENSED ONLY upon ORAL or WRITTEN PRESCRIPTIONS of a practitioner.

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Hematomas of the Small Bowel— Three Etiologies

By Wm. T. Meszaros, M.D., Franz Gampl, M.D., AND VICTOR SPIWAK, M.D. / CHICAGO

Hematomas of the small bowel are important to the clinician, since they produce findings of an acute abdomen. Accurate diagnosis is important, since surgery is unnecessary in most cases.⁶

Etiology

Three common causes of small bowel hematomas are: (1) trauma, (2) anticoagulant therapy, and (3) blood dyscrasias.

TRAUMA. Blunt trauma is usually the cause of traumatic hematomas. They tend to involve the duodenum. The duodenum is relatively fixed by the ligament of Treitz. Therefore, instead of being displaced by trauma, the duodenum, is compressed against the spine, resulting in hematoma.

ANTICOAGULANT THERAPY. There is an increasing use of anticoagulants for diseases such as myocardial infarction and thrombophlebitis. These drugs interfere with normal clotting and result in a tendency to bleed. One of the sites of bleeding is into the wall of the small bowel. Drug hematomas tend to be more extensive than traumatic hematomas, and may involve virtually the entire jejunum. The duodenum, ileum and colon may also be affected.

BLOOD DYSCRASIAS. Bleeding into the wall of the small bowel occurs in blood dyscrasias, such as hemophilia, Henoch's purpura and idiopathic thrombocytopenic purpura.⁴ The site and distribution of these hematomas are similar to those produced by anticoagulant therapy.

These reports are from the Department of Radiology at Illinois Masonic Hospital, Chicago, where Dr. Meszaros is Director and Dr. Spiwak is Associate Radiologist. Dr. Gampl is currently Director of Radiology at St. Elizabeth's Hospital in Chicago.

Pathology

Pathologically there is bleeding into the wall of the small bowel. In the duodenum, the bleeding is usually (but not always) localized, for which the term "hematoma" is appropriate. In the jejunum and ileum, the bleeding is more diffuse, and the terms intramural "bleeding" or "hemorrhage" would be more descriptive. In this article, "hematoma" will be used as a general term in referring to intramural bleeding involving the duodenum, jejunum and ileum.

The hematoma produces thickening of the wall of the small bowel. The thickened wall encroaches on the lumen, which may result in partial or complete obstruction.

Clinical Symptoms

The most common symptom is abdominal pain. The onset is usually sudden. The pain may be dull or sharp. The pain is usually cramp-like, but is occasionally constant. These findings simulate diseases which produce an acute abdomen, such as appendicitis, pancreatitis or bowel obstruction.

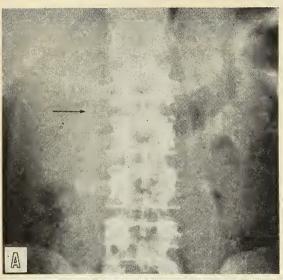
Nausea and vomiting are frequent symptoms. A low-grade fever is usually present. Hematemesis and melena are only occasionally observed.

Physical Examination

Abdominal tenderness is present. The tenderness is located in the upper abdomen with duodenal hematomas, and lower with hematomas of the jejunum or ileum. Rebound tenderness is usually absent, but may be present.⁹ Muscle guarding may or may not be present.

Abdominal distention is frequently noted. A vague mass may be palpable. Bowel sounds are hypoactive or absent.

TRAUMATIC HEMATOMA OF DUODENUM



- Fig. 1. Case I. Male, age 25, with nausea, vomiting and severe pain in the right abdomen which began two hours after blunt abdominal trauma.
- A. Plain film on the day of injury, demonstrating an indistinct upper right psoas shadow (arrow).
- B. Barium meal seven days following injury. The stomach is dilated, atonic and does not empty.
- C. Repeat barium meal 12 days following injury. There is a mass in the third portion of the duodenum, with some narrowing of the lumen. Note widening of the duodenal loop due to extrinsic pressure. Gastric emptying is slow, but has improved since previous study.
- D. An oblique film of the same examination shows a mass with stretching and crowding of the mucosal folds ("coil-spring" appearance) (arrows).

The patient improved rapidly and was asymptomatic on discharge from the hospital twenty-one days after injury.







In hematomas secondary to blood dyscrasias or anticoagulant therapy, ecchymosis of the skin may be present.

Laboratory Findings

The white blood count is frequently elevated.

A highly suggestive finding is a drop in hematocrit without visible blood loss. In other cases melena may be observed.

With blood dyscrasias or anticoagulant therapy, the prothrombin time or clotting time is increased. Hematuria may occur in these cases.

Roentgenologic Findings

The roentgenologic examination is of great value in the diagnosis of hematomas of the small bowel. In 1948 Liverud⁵ noted roentgenologic abnormality, but in 1954 Felson and Levin² were the first to make the correct preoperative diagnosis of traumatic duodenal hematoma. They recorded diag-

nostic criteria both for plain roentgenograms and barium studies. In 1958 Pearson and Mac Kenzie⁸ published roentgenograms of a case of bleeding due to anticoagulant therapy in which there was abnormality of the small bowel on plain films. In 1961 barium studies of drug hematomas were described by Wiot et al.¹³ Senturia et al.¹⁰ and Culver et al.¹

Plain Roentgenograms

Distention of the small bowel is frequently observed. This finding was illustrated roentgenographically in 1958 by Pearson and Mac Kenzie.⁸ The small bowel distention may be either of the obstructive or paralytic ileus type. The distended loops tend to be in the upper abdomen with duodenal hematomas, and are lower or more diffuse with jejunal or ileal hematomas. Some gas is usually present in the colon.

The right psoas shadow is not visualized or is poorly visualized. This is most typical

DRUG HEMATOMA OF DUODENUM



Fig. 2. Case II. Woman, age 71, on anticoagulant therapy for thrombophlebitis. Prothrombin time 35 seconds (control, 13 seconds).

A. Hematoma of the third portion of the duodenum, producing an intramural extramucosal mass, with typical sharp margins (arrows).

of duodenal hematomas, but is also observed in hematomas of the jejunum or ileum. (If gas is noted along the psoas margin, traumatic rupture of the duodenum should be suspected.)

Sears et al.⁹ emphasized the "thick-bowel" sign. This was described by Wolf et al.¹⁴ and by Nelson and Eggleston⁷ in cases of small bowel infarction due to mesenteric vascular disease. The "thick-bowel" sign is characterized by a thin column of gas which represents the narrowed lumen of the small bowel due to thickness of its wall. This is a valuable roentgenologic finding, when present. It is not pathognomonic, and may occur in any disease producing thickness of the wall of the small bowel, such as tumors, regional enteritis, or mesenteric vascular disease. In such cases, correlation with the history is helpful.

Complete obstruction may be produced by small bowel hematomas. The "thick-bowel" sign is then lost. In such cases a mass may be observed, resulting in the "pseudotumor" sign.¹¹ The "pseudotumor" sign is observed in strangulated loops from any cause. The findings must be interpreted in conjunction with the history.

Barium Studies

DUODENUM. There is an intramural



(There is residual barium in the colon from a previous barium meal.)

B. Repeat barium meal five days later. The mass is less distinct. The stretched mucosal folds are still apparent (arrows).

Rapid improvement is characteristic of hematomas.

extramucosal mass, with characteristic sharp margins. The mass may produce extrinsic pressure on adjacent structures such as the stomach, duodenal loop or colon. The lumen is usually stretched and widened by the hematoma. In some instances, the lumen is eventually narrowed, and this may progress to partial or complete obstruction. Characteristic changes occur in the mucosa. There is stretching and crowding of the valvulae conniventes, producing a "coilspring" appearance. These findings are predominately due to a localized hematoma. This results in the diagnostic findings described by Felson and Levin: Intramural mass plus "coil-spring" appearance.

When duodenal bleeding is more diffuse, the roentgen appearance is different. The lumen is diffusely narrowed, and the mass is not seen. The "coil-spring" appearance is also lost. Instead, there is a diffuse thickening of the mucosal folds, resembling a "picket-fence."¹³

Therefore, the duodenal changes may be localized or diffuse. One usually expects the localized changes in traumatic cases and the diffuse changes in the non-traumatic cases. This is not always true. In bleeding due to anticoagulant therapy, for example, duodenal changes may be diffuse¹³ or localized (Fig. 2.).

HEMATOMA DUE TO BLOOD DYSCRASIA





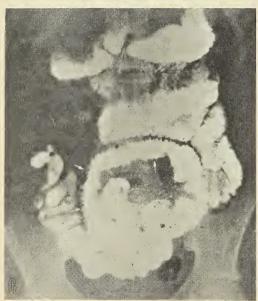




Fig. 3. Case III. Male, age 18. Plasma thromboplastin component deficiency (Hemophilia B, Christmas disease) was diagnosed by Dr. Joseph Robbins, who will report this case in detail at a later date. Venous elotting time determinations ranged from one hour to over 26 hours. There was nausea, vomiting and abdominal pain. Rebound tenderness was noted in the right lower quadrant,

A. Plain film demonstrating small bowel distention due to paralytic ileus. Right upper quadrant mass. Narrowed loop in right lower quadrant demonstrating the "thick-bowel" sign (arrow). Right psoas shadow is indistinct.

B. Small bowel study. Thirty-minute film demonstrating narrowing of the small bowel (arrows) due to intramural hemorrhage. Note "thumbprinting" (short arrow). Other portions of the small bowel are dilated.

C. Ninety-minute film. Mucosal folds are coarsened but intact. Folds vary in thickness and height, producing appearance described as "spike-like," "picket-fence" or "stacked-coins" (arrows).

D. Two months later. Marked improvement. Folds are only slightly thickened.

JEJUNUM AND ILEUM. The changes tend to be more diffuse than with duodenal hematomas. The bowel wall is thickened and the lumen is narrowed by the hemorrhage. The involved segment shows some rigidity. There is thickening of the mucosal folds, which vary in thickness and height. The true width of the bowel is outlined by "spike-like" projections of barium between the thickened folds, producing the "stacked-coin"4 or "picket-fence"13 appearance. As a rule, the mucosal folds are sharply outlined. They may be blurred by associated edema or may be completely effaced. There is a rather abrupt transition from the normal to the abnormal segment. Occasionally rounded marginal defects are present ("thumbprinting"). An associated mesenteric hematoma may produce a mass, indenting the mesenteric border of the involved loop. Khilnani et al.4 have observed transient intussuception proximal to the hematoma in one case.

These changes are reversible. Improvement begins in a few days, and may be complete in two weeks. In some cases, com-

plete resolution may take several months.¹ DIFFERENTIAL DIAGNOSIS. Inflammatory disease of the small bowel should be suspected when there is irritability, spasm, and ulceration. Neoplastic disease can often be identified by the presence of multiple nodules or ulceration. Mesenteric vascular disease may be more difficult to exclude. ¹² There tends to be more irritability. In occlusion of the superior mesenteric artery, the proximal colon is involved. Barium enema reveals a dilated proximal colon, with poor evacuation. As the disease progresses, mesenteric vascular disease frequently results in a stricture of the small bowel, whereas the changes due to a hematoma of the small bowel usually resolve completely.

Treatment

CONSERVATIVE TREATMENT. This is the treatment of choice, since small bowel hematomas are usually rapidly reversible. In addition, patients with bleeding tendencies are poor risks. Patients with drug-induced hematonias are poor surgical candidates, since the anticoagulants are frequently given for coronary disease.

Conservative management includes intravenous vitamin K, suction, blood and other intravenous fluids.

SURGICAL TREATMENT. Some of the indications for surgery are shock from severe hemorrhage, a perforated viscus, and failure of conservative management.3

Duodenal hematomas may be treated by incision and evacuation of the hematoma. If obstruction cannot be relieved in this manner, gastroenterostomy is of value. In jejunal or ileal hematomas, segmental resection may be performed if there is doubtful viability of the bowel.

Summary

Hematomas of the small bowel are of considerable clinical significance, since they produce findings of an acute abdomen.

Three common causes of small bowel hematomas are: (1) trauma, (2) anticoagulant therapy, and (3) blood dyscrasias. If these etilogic factors are considered, the clinician will usually suspect the diagnosis.

The roentgenological examination is of great value in confirming the clinical diagnosis of hematomas of the small bowel. Accurate diagnosis is essential, since conservative treatment is usually satisfactory.

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(Continued on page 192)

Glossary of Chromosomal and Genetic Terms

By JACK P. COWEN, M.D.

PART II

Note: Part I of this Glossary appeared in the July issue of the Illinois Medical Journal and will be concluded in the September issue. Part I definitions started with "Acrocentric" and stopped with "Expressivity."

Female Carrier: A woman who is heterozygous for a recessive X-chromosonal gene. Half of the sons of a female carrier show the recessive X-chromosomal feature.

Gamete: In bisexual organisms, the mature germ cell of either sex (spermatozoa or ova) containing the haploid ("n") number of chromosomes.

Genes: The basic ultramicroscopic intramolecular units of heredity, arranged linearly at definite points (LOCI) in a chromosome. They occur in pairs (ALLELIC GENES) situated at corresponding loci of a pair of homologous chromosomes and are capable of producing externally visible body traits composing the phenotype. Apparently, genes function by controlling enzymatic action.

Gene Mutation: A mutation which involves only a single gene.

Gene Product: The specific protein or polypeptide molecules which depend on the presence of a gene are called primary gene products, frequently enzymes. Enzymes can synthesize most of the other molecules, such as complex polysaccharides, lipids, and even deoxyribonucleic acid and ribonucleic acid. However, enzymes cannot synthesize proteins. For this, ribonucleic acid is required, which translates the information contained in the genes into the synthesis of the gene products.

Genome: The haploid set of chromosomes and the genes located in it.

Genomic Mutation: A mutation which alters the normal number of chromosomes of an individual. If the result of this is a whole multiple of the haploid set of the chromosomes, then one also speaks of "PLOIDIC MUTATION."

Genotype: The genetic constitution of an organism, regardless of the external appearance. Thus, a genetic female may have the physical appearance (PHENOTYPE) of a male, and vice versa. Because of the Mendelian phenomena of segregation and recombination, together with exchanges of genes occurring during meiosis, it is probable that no two individuals (barring identical twins), in the course of mankind's existence, have ever had the same genotype.

Gynandromorphism: The condition of sexual mosaicism in an organism of a bisexual species. Such an individual possesses male and female tissues, with corresponding chromosomes of both sexes, in different parts of the body, other than the gonads. This abnormality is due to chromosomal aberrations (such as the simple loss of one of the X-chromosomes) occurring during embryologic development. However, in some species, such as the silk-worm, it may be gene-determined.

Haploid: The half number ("n") of the basic chromosomal complement (deploid or 2"n") of a species. The haploid number consists of one of each pair of chromosomes and is the normal condition in mature germ cells.

Hemizygous: Normal diploid cells, with their pairs of homologous chromosomes

and genes, are either HOMOZYGOUS or HETEROZYGOUS for each pair of genes, depending on whether the alleles of a pair are identical or contrasting. The HEMIZYGOUS condition refers to the presence of an unpaired gene or chromosome. Haploid gametes, which are normally a single set of chromosomes, are therefore hemizygous for the genes carried in these chromosomes. Also, the normal diploid heterogametic zygote, containing the partially or totally non-homologous X- and Y- chromosomes, is hemizygous for the genes represented in the non-homologous segments of the dissimilar sex chromosomes. Hemizygosity, as an abnormality, exists in MONOSOMIC cells in which only one member of a pair of homologous chromosomes is present. Such cells are accordingly hemizygous for the genes located in this particular chromosome.

Hermophroditism: The intersexual condition in which male and female genital structures exist in an individual of a bisexual species. An intersex is a TRUE HERMAPHRODITE when gonadal tissue of both sexes is present, and a PSEUDO-HERMAPHRODITE (male or female) when the gonads contain either testicular or ovarian tissue respectively, but not both. In either case, varying combinations of male and female development are found in the genital tract.

Heterochromatin: The chromatin material occupying a chromosomal segment which exhibits variations in condensation and in staining intensity (heteropycnosis). This is in contrast to the remaining euchromatic portion of the same chromosome which shows no such variation. (Fig. 3.) The heterochromatic regions of chromosomes may

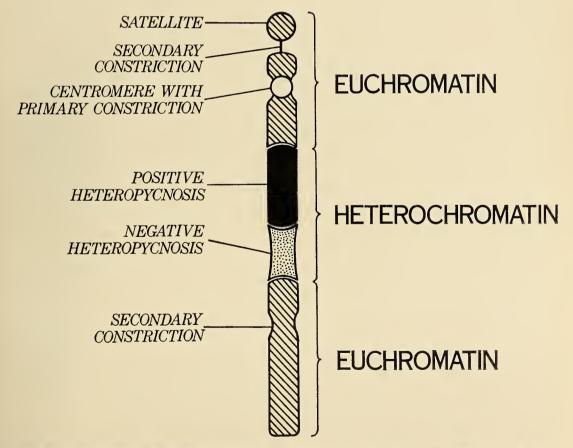


Fig. 3. (After Sohval) Schematic representation of certain morphologic and differential staining characteristics found in some but not all chromosomes. (A centromere and its primary constriction are present in ALL human normal chromosomes). See Glossary for explanation of terms.

appear thick and intensely stained (POSITIVE HETEROPYCNOSIS), or thin and weakly stained (NEGATIVE HETEROPYCNOSIS). Heterochromatin is generally believed to be lacking in genes directly concerned with hereditary transmission, although it probably exerts a modifying effect on near-by genes in the euchromatic zone. At metaphase it is usually indistinguishable from euchromatin. Heterochromatin is of particular interest in the X-chromosome in which (in man) it may occupy the entire length of the short arm.

Heterogametic: This refers to the XY or XO sex which produces two kinds of gametes (X, and Y or O) in equal numbers, whereas the XX series is said to be HOMOGAMETIC, since it produces only one kind of gamete (X). In most bisexual species, the male sex is heterogametic so that there are two kinds of sperms (X- and Y- containing) but only one kind of egg (X-containing). In certain insects, birds, and fishes, the reverse is true, the females being heterogametic and the males homogametic.

Heteropycnosis: The phenomenon exhibited by the heterochromatic region of a chromosome, characterized by variations in the degree of condensation and in the intensity of staining. (Fig. 3.) When the heterochromatic segment appears thicker and stains more intensely than the rest of the chromosome, it is said to show POS-ITIVE HETEROPYCNOSIS. This is particularly evident at prophase, but these regions may also remain condensed during interphase where they are recognized as chromocenters. Positive heteropycnosis is usually developed to a greater degree in sex chromosomes than in autosomes. When the heterochromatic zone appears thinner and more faintly stained than the remainder of the chromosome, it exhibits NEGATIVE HETEROPYCNOSIS. The heterochromatic region of a chromosome may be positively heteropycnotic at one stage of the miotic cycle and negatively heteropycnotic at another stage of the same cycle.

Heterozygous: This refers to a zygote having a pair of dissimilar or contrasting alleles controlling a certain trait or characteristic. When the two members of a pair of genes are alike, the organism is HOMOZYGOUS for that trait or character.

Holandric: This refers to genes situated in that portion of the Y-chromosome which does not pair with the homologous segment of the X-chromosome. The concept of holandric genes is not universally accepted. However, if they do exist, such genes would be transmitted from an affected father to all his sons and the trait caused by such a gene will not occur in women. They are therefore completely SEX-LINKED, since no crossing over occurs. Genes for certain rare skin conditions, hypertrichosis of the ears and webbed toes are claimed to be examples of holandric genes.

Hologynic: Inheritance from a woman to all female descendants. This occurs in Drosophila as a consequence of non-disjunction of the X-chromosome. In man, hologynic heredity is not known.

Homogamy: If chance does not prevail in matings within a population, but if like genes are joined with higher-than-chance frequency through mating, this is called homogamy. The opposite (random mating) is called "PANMIXIA."

Homozygous: See HETEROZYGOUS.

Human Genetics: The study of human differences which are determined by heredity. Since it is impossible to see from the beginning whether or not the differences are determined by heredity, human genetics frequently concerns itself with non-hereditary differences also. The proof that differences determined by environment are not inherited is also a field for human genetics. To this extent, human genetics can also be defined more generally as the science of the causes of human differences.

Hybrid: The progeny of two parents who differ genetically in any way. Also termed a CROSS.

Hyperploid: The aneuploid condition in which there is more than the normal diploid number of chromosomes, as exemplified by 2"n" plus 1, or 2"n" plus 2 in man with 47 or 48 chromosomes. See ANEU-PLOIDY, TRISOMIC.

Hypoploid: The aneuploid condition in which there is less than the normal diploid number of chromosomes, for example, the 2"n" minus I state in man with 45 chromo-

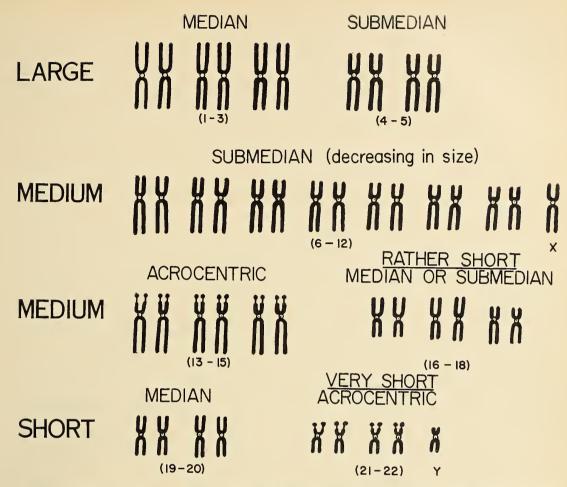


Fig. 4. (After Sohval) Idiogram of normal human male with 22 pairs of autosomes and an XY sex-chromosome constitution. The chromosomes are arranged in seven groups (A to G), according to their length and centromere prosition. The classification is a slight modification, after Pateau, of the international system of nomenclature of human mitotic chromosomes adopted in 1960 in Denver, Colo.

somes. See ANEUPLOIDY, MONOSOM-IC.

Idiogram: A diagrammatic representation of the chromosome constitution (KARYOTYPE) of the cells of an individual. Customarily, the chromosomes are systematically arranged according to size and centromere position. (Fig. 4.)

Intermitotic: The state of the resting nucleus, i.e., when the cell is not undergoing division. Chromosomes, as such, are not visible during this phase. Actually, the nucleus is not "resting" since biochemical activity is at its height at this time. Also termed INTERPHASE.

Interphase: See INTERMITOTIC.
Intersex: See HERMAPHRODITISM.

Inversion: A structural chromosomal aberration characterized by the rearrangement (reversal) of a portion of the gene sequence. It occurs as a result of the breakage of a chromosome at two points followed by a reversal of the replaced fragment with respect to the rest of the chromosome.

Isoallels: Alleles which, though so nearly identical that their effects cannot usually be distinguished, may have different modifying effects on genes inherited with them. An example will make this clearer. If a patient and several of his sibs have inherited Hunnington's chorea from their father, the abnormal gene will be partnered in the patient and in all of the affected sibs by the normal allele inherited from the mother.

This may influence the expressivity of the gene so that the disease varies slightly in different generations—in the father the abnormal gene will have been partnered by a different normal allele. The normal alleles in the father and in his children are said to be ISOALLELES.

Isochromosome: An abnormal chromosome arising through the misdivision of the centromere. Normally, during the separation of the chromatids at anaphase, the centromere divides in the longitudinal axis of the chromosome so that the daughter chromosomes are identical with one another. However, if the centromere misdivides, i.e., in a transverse rather than in a longitudinal plane, each of the two separated centromere fragments remains attached to the chromatids of one arm. Thus, the two new chromosomes (isochromosomes) differ from one another. Each is composed of two arms of equal length and the arms are genetically homologous with each other. It is apparently possible that this type of chromosome aberration, known to occur in maize, may also occur in man. In this event, it might help to explain certain unusual and peculiar karyotypes in which there is an extra median chromosome.

Karyotype: A group of characteristics (number, size and form) used in identifying a particular chromosome constitution. For purposes of demonstration, a karyotype is a systematized array of the metaphase chromosomes of a single cell, typifying the chromosomes of an individual. It is customary to arrange the chromosomes in descending order of size, and according to the position of their centromeres. (Fig. 4.)

Kinetochore: See CENTROMERE.

Lethal Factors: Disorders of the genetic material which leads to the death of the zygote, or of the individual developing from it before attaining the age of reproduction. This can be a matter of lethal genes or deficiencies due to missing sections.

Lethal Gene: A mutant gene which acts as a lethal factor.

Linkage: Non-allelic genes which lie in the same pair of chromosomes are called linked.

If they are in the same chromosome ("coupling phase") they are transmitted together to the descendants (exception: "crossing over"); if they lie in two different chromosomes of a homologous pair, a child obtains either one or the other gene (exception: "crossing-over" has the result that a child may receive both genes). "Crossing-over" is so frequent that no great practical significance is attached to linkage.

Linkage: Technically, a term applied to two different genetic phenomena: linkage between a gene and a chromosome, and linkage between two genes. Accordingly, it may refer to the location (linkage) of a single specific gene in sex chromosomes (see SEX-LINKED, HOLANDRIC) or in autosomes. (Most hereditary disorders in man are determined by autosomal genes). On the other hand, the term also refers to the association of two or more genes (such as those for body color or wing size in the Drosophila) which tend to remain together during the hereditary transmissions because they are located on the same chromosome. However, linked genes are capable of separation by means of crossing over. In the latter event, such genes show INCOM-PLETE linkage to each other.

Median: This refers to the location of the centromere of a chromosome midway between the two extremities. The arms of the chromosomes are therefore of equal length. Also termed METACENTRIC.

Meiosis: A specialized type of cell division characterized by a mechanism which provides for a reduction in the number of chromosomes from the somatic or diploid number of the sperm and eggs, to the haploid number, fertilization then restoring the somatic number in the zygote. Meiosis consists of two different types of division. The first, designated MEIOSIS I, is known as the reductional division, because separation of homologous pairs of chromosomes results in a reduction in the chromosome number. The second meiotic division, designated MEIOSIS II, is the equational division which is essentially mitotic in type, involving the separation of equally constituted sister chromatids. (Fig. 1.)

Metacentric: See MEDIAN.

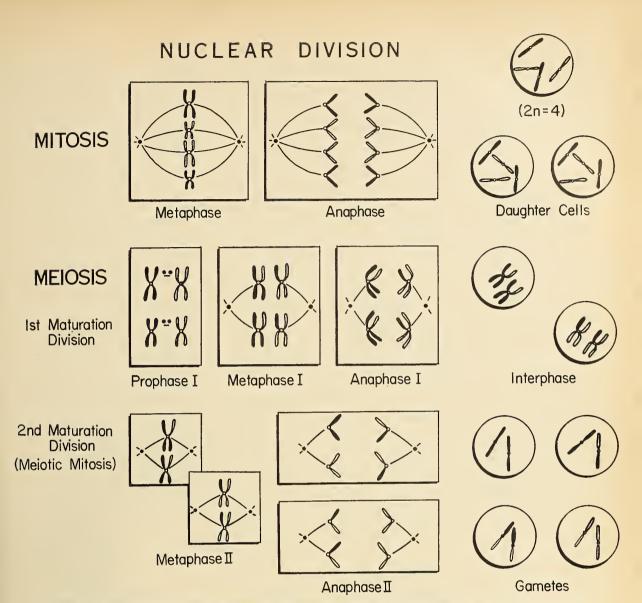


Fig. 1. (After Sohval) Highly schematic representation of the distinguishing features of mitotic and meiotic division. The parent cells contain two pairs of chromosomes, the dark and light members of each pair being derived from the mother and father respectively. In mitotic metaphase, each chromosome is reduplicated and arranged separately on the equatorial plate. During anaphase, the longitudinal halves of the chromosomes separate and pass to opposite poles producing daughter cells whose chromosomal constitution is identical with the parent cells. At metaphase of the first meiotic division, the reduplicated members of each homologous pair are together in synapsis on the equatorial plate. Exchange of chromosomal material (crossing over) has just taken place during prophase. During anaphase, whole reduplicated chromosomes of each pair diverge poleward to produce daughter cells containing half the diploid number. Metaphase of meiosis II is essentially mitotic in character, resulting in gametes containing the haploid number of chromosomes, but with varying compositions of parentally derived chromosome material.

Metaphase: Phase of cell division characterized by complete disappearance of the nuclear membrane and by the formation of the spindle. At this time, the chromosomes are maximally contracted and are arranged on the equatorial plate preparatory to separation. In mitosis, the metaphase chromosome has a single centromere which be-

comes functionally double only at anaphase when the chromatids begin to move to opposite poles. In the first meiotic division, which consists essentially of separation of paired homologous chromosomes, each bivalent has two centromeres. In the second meiotic division, metaphase is similiar to that of ordinary mitosis. (Fig. 1) See MITOSIS.

Mitosis: The process of cell division, in which the chromosomes and their genes participate, resulting in daughter cells which are qualitative and quantitative hereditary counterparts of the parent cell. It is divided into five stages: INTER-PHASE (resting), a relatively prolonged PROPHASE, a brief METAPHASE and ANAPHASE, and a TELOPHASE of intermediate duration. In man, a complete cycle is said to last about twenty-four hours, the interphase lasting about twenty hours, prophase three hours, and the remaining phases a matter of minutes.

Monosomic: An aneuploid individual in whom there is a loss of one of the two members of a pair of homologous chromosomes. When it occurs spontaneously, this condition results from the meiotic NON-DIS-JUNCTION, i.e., failure of the members of a pair to separate at anaphase, so that one resulting gamete contains both members of the pair ("n" plus 1) while the other lacks either member ("n" minus 1). Upon union with a normal gamete at fertilization, the offspring are either therefore 2 "n" plus 1 (TRISOMIC) or 2 "n" minus (MONOSOMIC), respectively, for this particular chromosome. These conditions are referred to as HYPERPLOID and HYPOPLOID, respectively. See ANEU-PLOIDY.

Mosaic: The presence of genetically dissimilar cells in adjacent tissues of an organism. Equivalent to CHIMERA.

Mutation: A change in a gene. The mutant gene is capable of transmission and thus of producing hereditary variations when it is present in germ cells. Mutation may also take place in somatic cells, in which case the mutant gene cannot be sexually transmitted. Mutant genes are usually recessive to the wild type. Mutations may occur spontaneously or they can be induced by radiation, by ionizing and other electromagnetic waves (x-ray, radium, ultra-violet, supersonic, ultra-short radio waves) and by chemical mutagens, such as nitrogen mustard.

Non-Disjunction: A type of abnormal chromosomal behavior during nuclear division. (Fig. 5). It may occur in mitosis or in meiosis, and is characterized by the fail-

ure during anaphase of the longitudinallydoubled chromosomes or of the members of a pair of homologous chromosomes to separate. As a result, one daughter cell receives both chromosomes while the other acquires none. Meiotic non-disjunction may be primary or secondary. PRIMARY NON-DISJUNCTION occurs in one or both parents, with the production of gametes containing an abnormal chromosomal consti-SECONDARY NON-DISJUNC-TION refers to its occurrence during meiosis in an individual who is abnormal from the beginning, being a product of the union of gametes, one of which was nondisjunctional.

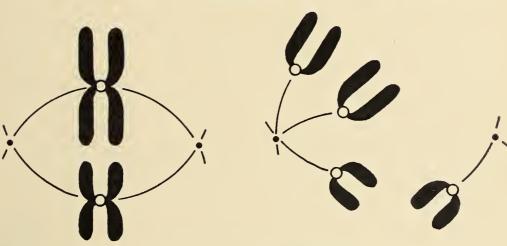
Parameter: A set of measures of a variable character, e.g., a series of variable heights of individuals.

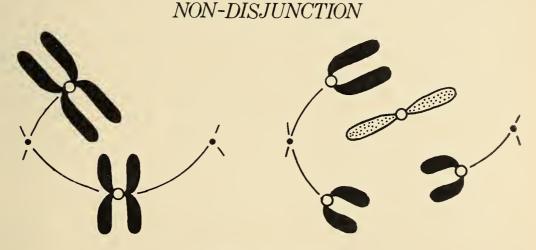
Penetrance: This refers to the regularity with which a gene produces its effect. Penetrance is said to be "complete" if a dominant gene produces an effect in each person carrying it, or if a recessive gene causes its effect in each individual homozygous for it. It is said to be "reduced" if some but not all persons exhibit the trait even though the gene is present in the required heterozygous or homozygous stage. If the phenic effect of a gene is shown not regularly but only in a certain percentage of cases, one speaks of a penetrance of so-and-so-many percent. If the penetrance of a gene deviates strongly from one hundred percent, doubts about the genetic hypothesis are justified. Compare with EXPRESSIVITY.

Phene, Phenic: The features which are assigned to certain genes or configuration of genes are called PHENES. The expression is not equivalent to PHENOTYPE.

Phenocopy: A reproduction or copy of a gene-producing phenotype which is visibly indistinguishable from it. It occurs in the offspring of pure normal individuals as a non-hereditary modification produced by certain experimental conditions. In other words, if an exogenous influence leads to the same phenic characteristics as does a certain genotype, the first instance is called a PHENOCOPY. The deaf-mutism in the offspring of mothers who have had rubella in the first three months of pregnancy is indistinguishable from the inherited type.

METAPHASE ANAPHASE NORMAL





SIMPLE LOSS

Fig. 5. (After Sohval) Chromosome movement in cell divisiou. (Top) During "normal" metaphase the longitudinally-doubled chromosomes are arranged in the midline equatorial plate. A chromosomal fiber extends in opposite directions from the centromere of each chromosome to the opposing centrioles. In anaphase the halves (chromatids) of each chromosome separate and are known as daughter chromosomes. They migrate to opposite poles of the cell, presumably being drawn there by their respective centromeres. (Middle) NON-DISJUNCTION is characterized by the failure of the daughter chromosomes to separate (disjoin) during anaphase. Instead, both migrate to the same pole of the anaphase nucleus. As a result, one daughter cell receives an extra chromosome while the other cell becomes deficient in this chromosome. (Bottom) SIMPLE LOSS of a chromosome is sometimes due to the failure of a metaphase chromosome to become oriented on the equatorial plate, Apparently, the centromere of one but not of the other member of a pair of chromatids is effective in drawing its daughter chromosome towards the pole of the anaphase nucleus. The daughter chromosome with the inactive centromere fails to migrate to the nucleus of either daughter cell. It remains in the cytoplasm where it eventually disintegrates.

Phenogenetics: The science which attempts to explain the chain of causality between genotype and phenotype. Phenogenetics is more a part of developmental physiology than of genetics.

Phenotype: The manifest picture of an organism that is the totality of its external and internal characteristics, those which are genetically determined as well as those depending on the environment. The expression has frequently been misunderstood and usually can be dispensed with.

Pleiotropism: A gene which determines several characteristics is called PLEIOTROPIC or POLYPHENIC. A gene might have a major effect, such as that controlling the production of a blood group antigen and also play a minor role in predisposing to duodenal ulcer.

Point Mutation: A mutation which is not accompanied by a morphologically demonstrable change in the chromosome. In practice, it may be regarded as equivalent to a gene mutation.

Polygenic: A feature, usually a quantitatively variable character, is polygenic if it is dependent on numerous genes. Most quantitatively variable physiological characteristics have polygenic inheritance. The involved genes are also designated as polygenes.

Polymerism: Polygenic effect in which the participating genes are of equally strong effectiveness.

Polymorphism: The simultaneous occurrence of two or more different genotypes in the population whose ratio is kept in equilibrium by means of selection. Example: the genes for sickle-cell anemia and for normal hemoglobin.

Polyphenin: PLEIOTROPISM.

Polyploidy: The presence of exact multiples of the basic haploid number of chromosomes, higher than that found in the diploid state. This increase in chromosome number is due either to non-disjunction or to reduplication of the number of chromosomes in a somatic tissue with suppression of cytoplasmic division. In either case, there

results the addition of one or more complete chromosomal complements so that an individual may possess three (TRIPLOIDY) or four (TETRAPLOIDY) or more of each kind of chromosome. See EUPLOIDY.

Polysomic: An individual, an aneuploid in whom one or more chromosomes are reduplicated and are found represented three or four times. The abnormal number of chromosomes results from meiotic non-disjunction which, when only one extra chromosome is involved, produces a gamete containing "n" plus 1 chromosomes. When this abnormal gamete unites at fertilization with a normal germ cell (containing the haploid or "n" number), the resulting zygote has a 2 "n" plus 1 chromosomal constitution. Such a polysomic organism is also designated trisomic for the non-disjunctional chromosome. See ANEUPLOIDY.

Population Genetics: The science of the genetic composition of the population, seeking to determine gene frequencies and to detect the selective influence which determines the genetic frequencies.

Proband: The index patient, an individual with an abnormality whose relatives are studied in an effort to ascertain the hereditary or genetic aspects of the trait. Also termed PROPOSITUS.

Prophose: The first phase of cell division characterized by the transformation of the irregular network of chromatin material of the interphase nucleus into spirally coiled threads, which gradually become doubled, shortened, and thickened to form individual chromosomes. This phase terminates with the disappearance of the nuclear membrane, at which point metaphase starts. See MITOSIS.

Propositus: See PROBAND.

Pseudohermaphroditism: Sexual anomaly characterized by the presence of the gonads of only one sex, but associated with elements of both sexes in the genital tract. These individuals whose gonads are testes are male pseudohermaphrodites while female pseudohermaphrodites have ovaries. See HERMAPHRODITISM.

Recessive: This refers to a gene which fails to produce its effect in the presence of the

opposite or contrasting gene. A recessive gene produces its effect only when both members of a pair are recessive, i.e., when the individual is homozygous for this particular gene, having received it from both parents.

Recombination: The union of two members of a pair of genes for a given character. This occurs at fertilization, each gamete contributing its single member of a pair of genes. See SEGREGATION.

Reductional Division: The first meiotic division, characterized by the mere separation of members of homologous pairs of chromosomes, resulting in a reduction in the chromosome number from the somatic or diploid number to the haploid number. (Fig. I.)

Satellite: A small rounded body attached to the end of certain chromosomes by a delicate thread of chromatin. (Fig. 3.) These terminal bodies are produced by a "secondary constriction" in the distal portion of an arm of certain chromosomes. (The "primary constriction" is caused by the centromere). Satellites and their filaments are constant in their size and form for each particular chromosome. Therefore, they provide landmarks for the identification of these chromosomes. Recent evidence suggests that all acrocentric chromosomes are satellited.

Segregation: The process in sexual organisms, constituting the Mendelian first law of inheritance, by which only one of the two genes of a pair gets into each mature germ cell. Then, when gametes unite at fertilization, two genes for each trait or character are brought together in the new individual (RECOMBINATION). Segregation takes place during the reductional stage of meiosis, at which time homologous chromosomes separate, each carrying with it a single member of a pair of genes. Each pair of genes segregates independently of other pairs so that varying combinations (in gametes) and recombinations zygotes) are produced (Mendel's second law of inheritance, that of independent assortment).

Sex Chromosomes: The chromosomes, usually two in number, although in certain organisms there is only one, which are con-

cerned with the determination of sex of the offspring. In this respect they differ from all other chromosomes which are known as AUTOSOMES. There are two distinct sex chromosomes, the large X-chromosome and the small Y-chromosome. In many animals, including man, the nuclei of females contain the XX pair while the XY condition prevails in males. In some animals the female has two X-chromosomes but the male has only one X- and no Y- chromosomes. This is referred to as the XO type of male. In the case of the XY male, each sex chromosome is composed of two regions, the homologous portion known as the PAIRING SEGMENT and the non-homologous non-pairing region, designated as the DIFFERENTIAL segment. In certain insects, birds and fishes, the male has the equivalent of two X-chromosomes while the XY combination is found in the female. In such cases the sex chromosomes of the homogametic male are designated as ZZ and those of the heterogametic female as ZW. The W-chromosome is absent in some species, in which case the heterogametic female is ZO (comparable to the XO heterogametic male of some other species).

Sex-Influenced: This refers to genes which are dominant in one sex and recessive in the other, such as those for baldness, and for one form of white forelock.

Sex-Limited: This refers to genes, the penetrance of which is completely reduced in one sex, i.e., they are capable of producing traits in one sex but not in the other. The expression of these genes, at least in mammals and birds, apparently is dependent on the presence or absence of sex hormones. Examples of sex-limited characters include the coloring of certain butterflies and the plumage of birds.

Sex-Linked: This refers to genes located in a sex chromosome, X or Y. The best known sex-linked genes in man are those for redgreen color blindness, and hemophilia. These mutant genes are situated in the X-chromosomes and since they are recessive they express themselves predominantly in males. Genes located in the Y-chromosome are known as HOLANDRIC genes. See HOLANDRIC.

(to be continued)



PUBLIC HEALTH AND PIGEONS

Pigeons are not man's best friend. They are creating public health problems in addition to being messy and a nuisance. Those who doubt this should walk under Michigan Avenue near the Sheraton-Chicago Hotel or along the sidewalk bordering the city's library. Pigeon-lovers and feeders are a vocal group, but our officials now have enough ammunition to combat the pleas of our bleeding hearts.

A New York mycologist found that the fungi responsible for cryptococcal meningitis came from pigeon droppings and not from the soil. He was able to isolate the organisms from 50 per cent of samples of pigeon excreta whereas they were found in less than 1 per cent of soil samples. This serious disease responds to Amphotericin-B provided the drug is used early. Although the death rate has been cut in half, about 30 per cent of infected individuals still die.

Some people are allergic to the dandruff, feathers, and excreta of pigeons. The majority are subject to atopic diseases and develop asthma when exposed to the offending agents. Bird fancier's lung is different in

that it develops in nonatopic patients. After inhalation of antigens from avian excreta, an allergic alveolitis develops through the mediation of specific precipitins. In this respect, it is somewhat similar to hypersensitivity reactions that follow the inhalation of organic dusts responsible for farmer's lung and bagassosis.

The symptoms of bird fancier's lung develop insidiously or fairly abruptly following exposure. Rapid breathing, cough, malaise, and fever ensue. Scattered crepitations are heard but there is no evidence of airway obstruction. Chest X-ray shows slight mottling that is out of proportion to the severity of the symptoms.

The findings subside on removal of the stimulus but repeated or prolonged exposure may lead to diffuse reticulation and fibrosis. The corticosteroid drugs are most helpful in resolving the exudate and limiting pulmonary damage. Diagnosis is simple, provided the possibility is considered. Treatment consists of removal of the cause.

T. R. Van Dellen, M.D.

Implementation of a Family Planning Program by a Public Health Agency

By Jack Zackler, M.D., and Samuel L. Andelman, M.D., M.P.H.

On March 8, 1965, the Chicago Board of Health instituted its Family Planning Program through funds made available by the Children's Bureau of the Department of Health, Education, and Welfare through its grant to Maternity and Infant Care Project No. 502. This was done following a resolution adopted by the Chicago Board of Health in February, 1965, which directed that these services be provided to any woman on a voluntary basis and in whom there was a medical indication for family planning, if she was medically indigent.

This service was initiated at five of our clinics all of which are located in low socioeconomic areas. The clinics were opened for three hour sessions and no other services but family planning were provided during these sessions. We did not know how this program would be received by the community and our staff. We felt that many of the personnel would have reservations in participating in a family planning program because of either religious or moral feelings. In fact, the decision was rendered that any individual who did not want to work in such a program should not be obligated to do so, but all personnel are expected to refer a patient who inquires of the services to a facility where the service can be received. However, to our pleasant surprise we found that since this is a voluntary program and available to the individuals at their request, it was well received by our staff and there were very few who asked not to participate.

In-Service Program for Nurses

Almost at the same time that we opened our first clinic sessions we instituted an in-service program for our nursing staff dealing with the subject of the physiology of conceptual control. We felt that a family

Dr. Zackler is Director of Maternity & Infant Care Project No. 502 and Dr. Andelman is Commissioner of Health, City of Chicago

planning program is more than just dispensing medication but should also bear with it a complete understanding of the physiology involved in pregnancy and the control of pregnancy. This program was extremely well received by the staff as many of them did not completely understand the role of progestational agents or other methods utilized in family planning. We now realize that when we repeat our in-service program we should elicit the cooperation or our Mental Health Section to assist our staff in gaining insight into the psychological aspects of such a program both from their own and the patient's point of view. This will help them provide better counsel and guidance to the patient both at the clinic and in the home.

With the realization that a complete understanding was also necessary on the patient's part in order to obtain better results, our clinic sessions were so devised that time was allotted for education of the patient as to the physiology involved and the role of medication in family planning. Every patient admitted for family planning service has a history taken and the doctor gives a short explanation of the physiology involved and methods used. This is done by means of flip charts and slides. As many of our patients are Spanish speaking, we have our educational material available in both English and Spanish. Every patient then receives a complete physical examination and a blood serology as well as a Papanicolaou smear for cancer detection. We have long recognized that many people in the population to whom we provide care do not seek medical help unless the condition which they have becomes serious or critical. With the enrollment in family planning programs we have been able to examine these patients when they are supposedly well and as a result have discovered many who have been badly in need of medical

attention without being aware of it. Such conditions as cardiac disease, hypertension, diabetes, renal disease as well as positive Pap smears have been discovered in a significant number of applicants and they have been referred to specialty clinics for further care. This has led to prevention of loss of life and the savings of a great deal of medical costs which would have resulted were these conditions permitted to continue to emergency or terminal states. As an example, of the Pap smears done on over 6,000 patients, we found 53 with abnormal findings. Of these, nine had carcinoma in situ and one carcinoma in situ with micro invasions. All ten cases have been operated on and are presumably cured.

Telephone Answering Service

When we first instituted our clinics, each of our five clinics met for only a half day once a week. We anticipated that many of the patients would have problems or reactions to the medication. Therefore, cards were prepared with telephone numbers indicating where the patient could call each day of the week if any problems arose. Now it has been so arranged that if the patients have any problem on the day the clinic in which they are enrolled is not in session, they may call a central point to receive attention. As our case load began to grow we soon found it necessary to open additional clinics to provide care to all the applicants. It was then decided to make the family planning program part of the on-going maternal program. Family planning guidance is now provided by the same staff that is providing the prenatal and post partum care. Although this change made it possible for the patient to receive her post partum care and family planning guidance at the same time thereby eliminating the need for an additional visit, it tended to decrease the time available for the education of the patient. Instead of group lectures as had been possible in the five original clinics, the doctor now has to give clarification to each patient regarding the physiology and objectives involved. It is evident that he cannot go into as great detail as had been possible when family planning was the only service provided at the clinic. We noticed, however, a large increase in our post partum visits indicating that family planning was an inducement for the patients to present themselves for post partum examination. At present we have 17 clinics and 24 clinic sessions at which family planning is part of the service provided.

Problems with Oral Contraceptives

As the Board of Health decided that medication was the only form of family planning service to be given in the Chicago Board of Health clinics, we are using oral and intramuscular progestational agents as well as spermacidal foam products. The major indication for the use of the foam is to carry the patient until the oral or intramuscular medication can be started on the fifth day of her cycle. The younger patient seems to prefer the intramuscular progestational agent to the oral contraceptive because she needs not take medication daily but needs only to report to the clinic monthly for the injection. One of our problems with the oral contraceptives has been the manner of administration. The necessity of starting the dosage on the fifth day of the cycle and continuing for 20 days and re-starting again at the next cycle has led to a great deal of misunderstanding. Language barriers, lack of education and lack of understanding of the instructions makes this method impractical in a number of cases. Many patients forget to take the pill regularly, others continue to take the pills for several months without interruption. These failures to follow instructions create a disturbance in the menstrual cycle. This, of course, leads to discouragement on the part of the patient and may be responsible for many of the patients dropping from the program.

When the patient is first seen she is given a one month's supply of medication and seen again monthly until all problems have been resolved after which she is given a three months' supply and seen every three months. For the last few months we have started supplying some of our patients with a combination of 21 contraceptive tablets plus seven placebos. The intent of the 28 tablet package is to eliminate some of the confusion. With this regime we are able to instruct the patients to take one tablet every day with no interruption prior to and during the menstrual period.

Our rapidly mounting case load indicates that this program is readily accepted in the community. At present we have 17 clinics

(Continued on page 192)

Salmonella Infections In Domestic Animals

By Donald E. Baldwin, D.V.M.

I have been asked to speak this evening on the subject of the salmonellae. As a veterinarian I find this genus extremely interesting because of its relationship to a number of animal diseases which cause great financial loss to the livestock industry. The physician is obviously concerned about this organism because of its ability to produce serious disease in man. The microbiologist has, for years, been fascinated by the complexities of this notoriously ubiquitous group of organisms.

By way of review, the genus salmonella belongs to the family of organisms known as enterobacteriaceae. The genera included in this family contain most of those organisms commonly found in the intestinal tract of man and animals. Some of the more important of these include, in addition to salmonella, shigella, excherichia, proteus, aerobacter, klebsiella, paracolobactrum, erwinia, alginobacter, and serratia.¹

Indentification Difficult

Isolation of these organisms is not particularly difficult. However, identification is often extremely difficult. The family is composed of a large number of interrelated types which display almost every conceivable combination of biochemical characteristics compatable with the family definition. Antigenic composition can best be described as a mosaic which results in serological interrelationships among the several genera even extending to other families.

Salmonellae first came into prominence in the 1880's soon after the isolation of the so-called "hog cholera bacillus" by Salmon

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and Smith.2 The genus name was given to the group in honor of Dr. D. E. Salmon and the first organism of the group isolated was named salmonella cholerasuis. This organism was believed to be the cause of hog cholera but it was shown later that the disease was actually caused by a virus but that S. cholerasuis was an important secondary invader. During the next 30 years investigators isolated and identified a number of organisms of the genus found in association with diseases in animals and man. Some of the organisms studied and identified include S. typhi, etiological agent of typhoid fever in man, S. abortus-equi, which causes abortion in mares, S. gallinarium, cause of "fowl typhoid," S. typhimurium, causative agent of "mouse typhoid," and S. pullorum, etiological agent of bacillary white diarrhea or pullorum disease of young chicks.

Kauffman-White Scheme

Early investigators were soon perplexed by the problems presented in identifying organisms which apparently fit into the salmonella genus. Two isolates would possess many similarities yet many differences. Because of these problems little progress was made in the study of salmonella until after the work of White and Kauffman. These investigators studied the antigenic structure of the salmonella in great detail. Their work formed the basis for the serological typing system which bears their name and is used almost exclusively for identification of salmonella serotypes. Over 800 salmonella serotypes have now been identified using the Kauffman-White scheme.3

While salmonellosis has been recognized as a health problem of man and animals for over half a century, recent investigations suggest that this condition is more widespread than previously thought.^{4,5,6} Galton has noted a four-fold increase in

for August, 1967

human cases reported in the weekly Morbidity and Mortality Reports of the Communicable Disease Center between 1951 and 1961.⁷

Infection in Man and Animal

In a study in Florida the incidence of salmonella types isolated from man, hogs, and dogs was similar. Studies on fresh pork sausage and dog meals showed the distribution of salmonella serotypes to be similar to that found in man and animals. These studies suggest that infection in man and animals is spread from one to the other or is derived from a common source.

It is the general supposition that salmonellae have been present in animals and animal feeds since the time animals were first domesticated and used for food for man. It is also generally assumed that contaminated feed is the source of infection in most domestic animals. This may or may not be true.

The problem in animals lies in several areas. Where does animal feed become contaminated; if it does, how responsible is it for the disease we see in our domestic animals and birds; and how can we get rid of it? How widespread is the organism in wild animals and birds? Are there other reservoirs?

Commercial Feed Situation

First, let us look at the commercial feed situation. Feeds for cattle, horses, swine and poultry vary in the components that make them up. Many cattle feeds do not contain meat scraps or rendered products. The feeds are mostly cereal grains. These are not often sources of salmonella. Protein supplements such as cottonseed meal and soybean meal have been found to contain salmonella. Bone meal, which is sometimes found in cattle feeds, may be contaminated. Mineral mixes fed free choice are also a possible vehicle. For example, some years ago the largest selling mineral mix in one of our southern states was found to be heavily contaminated with S. anatum. About 100 salmonella infections in cattle were diagnosed over the three-month period during which this contaminated mix was being distributed and sold. This is, of course, circumstantial evidence. However, after considerable study no other source was apparent.

Experiment in Feed Transmission

An interesting experiment in feed transmission was carried out at the National Animal Disease Laboratory at Ames, Iowa.8 The work was undertaken to see whether pigs could be raised free of salmonella and other disease organisms. One hundred thirty-two duplicate fecal samples were obtained from a group of 66 pregnant sows. On only one occasion was salmonella isolated, and then only from one sow. It serotyped S. St-Paul. A group of the piglets were delivered from these same sows near term by hysterectomy, and 22 of the baby pigs were placed in separate incubators in absolute isolation. No opportunity for contamination was obvious. The piglets were fed a sterile milk replacer and not allowed to obtain colostrum from their dams. At seven days of age all piglets were started on a diet (No. 538) which consisted of a complete baby pig ration including rendered byproducts. Prior to feeding this, 247 samples of the feed were taken at random for culture. Two of the samples yielded Salmonella. The serotypes found were S. oranienburg and a nontypeable organism having the characteristics 28:Y.

Number of Organisms

Of the 22 piglets in this experiment, isolations of salmonella were made from 21 at varying intervals after starting on the baby pig ration. Three serotypes were isolated including S. oranienburg, S. bareilly, and S. Livingstone. The results of this work suggest that the number of organisms required to infect an animal need not be large.

As a sequelae to this study, basic components of feed No. 538 were obtained from the feed blender. These included bone meal, meat scraps, and meat and bone mixture. These ingredients were cultured for salmonella. 28:Y Monophasic was isolated from the bone meal; S. senftenberg and S. Tennessee from the meat scrap; and S. montevidco, S. newington and S. schwarzengrund from a mixture of meat and bone. It is interesting to note that of the serotypes from the complete feed, the meat ingredients, and the sow; only one—S. oranienburg—was found in the piglets. The investigator offered no explanation.

Storage of Complete Foods

More studies of this kind are being completed at various laboratories, and a number are now in the literature. How much transmission of this kind occurs in the farm situation is not known.

We know a few other things regarding animal feeds. We know, for example, that in most feeds the numbers of salmonella are usually small. A study by Niven, et al., has shown this. They also indicated that storage of complete feeds reduced the numbers of salmonella. In some, a mere 40 days was required for the feed to become negative for salmonella.

Salmonella are getting into animal feeds, and any of the 800-plus serotypes are capable of causing clinical disease under certain circumstances. Because animal by-products seem to be the most often incriminated vehicle for salmonella, many sudies have been conducted at rendering plants. The problem is simply that even though the heat of the extractor is sufficient to kill salmonella, recontamination occurs somewhere in the final bagging or storage operations so that the product is shipped to the blender contaminated. As yet, no practical solution has been found to correct this problem. It seems to be a recontamination of the finished product in each case.

Total Disease Figures Unavailable

The number of food animals that become infected annually from contaminated feed is not known, nor are national figures available for the total disease. Many serious outbreaks occur in calves, adult cattle, swine, sheep and poultry. Unfortunately, most of these are not investigated unless humans become involved. Simple economics many times prevent adequate studies, and some serious outbreaks may pass with little information derived from them.

It may be best to examine the problem by species as each has its own peculiarities. Poultry has received more attention than other species because of human involvement with egg products and the recognition of the importance of pullorum disease and fowl typhoid. The poultry interests have been most active in this area and have accomplished a great deal. For example, pullorum disease is practically non-existent when viewed nationally. Blood testing is carried out in turkeys in two states for S. typhimurium and successful programs are

in operation. Little progress has been made, however, with para-typhoids, and these are still a tremendous problem.

Recontamination During Processing

As is true in production of animal feeds, it appears that again the greatest difficulty in the production of human food concerns the build-up of salmonella organisms at the processing plant resulting in a recontamination of the dressed poultry. A report in 1964 by the Scientific Advisory Committee for The Pacific Dairy and Poultry Association summarized the situation regarding salmonella in poultry and poultry products. The chief recommendation that came out of this report is one not emphasized nearly enough:

The report emphasized that we must educate animal producers and food handlers in the basic principles of sanitation, animal supervision, and quality control. This applies in the poultry house, in the poultry dressing plant, in the egg handling and marketing, and in the home. Most problems would be eliminated, or at least appreciably reduced, if simple rules of good sanitary practice were followed. It has also been brought out by many individuals that the practice of using cracked or otherwise low-grade eggs poses a constant problem even where pasteurization is carried out.

Salmonellosis in Swine

Salmonellosis in swine has been studied by many workers in Europe and in the United States. Galton, et. al., 9 have shown that a great area of concern is related to the shipping, holding and slaughter of swine. These excellent studies point out that although most swine leaving the farm may be negative for salmonella organisms, the build-up of these bacteria in the holding pens of abattoirs is tremendous. As high as 80 per cent of the swine entering the slaughtering facility were found to harbor salmonella, and this contamination was carried through the plant and occasionally to the final product. It would seem that there is ample evidence upon which to act in cleaning up this problem area.

The association of S. cholerasuis with hog cholera is fairly well defined. Primary salmonellosis is also seen in swine at the farm and is generally associated with poor sanitary conditions. However, here again pig feeds do contain meat scraps and other rendered products. The extent to which these salmonella-contaminated feeds are responsible for frank disease at the farm level is not known.

Cattle Infection Underestimated

Salmonellosis in cattle has long been overlooked and underestimated. Numerous reports of serious outbreaks in calves and adult cattle are available. A study by Rothenbacher in Michigan 10 indicated a high incidence of S. Typhimurium infection in calves. Similar studies in California revealed 276 salmonella isolations from cattle in 1963. Of these, 134 or 49 percent were S. typhimurium, followed by S. dublin and S. newport. These infections were not confined to single areas of the industry, but were spread through the dairy cattle, calves and feeder cattle. It is often suggested that some form of stress is required for most outbreaks to take place. However, in most cases the significance of environmental factors is not always clear. What part is played by feed contamination, poor sanitation at all levels, wild animals, and soil contamination is not well known.

Chain of Infection

It is obvious that we do have a problem. Basically, we need to examine all phases of our problem in animals. We have emphasized certain areas where we have found salmonella organisms, such as animal byproducts, without adequately investigating other possibly important areas such as the production area, transportation, slaughter and processing. I do not mean to convey the idea that these areas have been neglected. I only mean that perhaps too much emphasis has been placed on what many believe to be the source of the problem: Animal feeds. These are attractive and appear as a part of a cycling of the disease. Many believe the chain of infection could be broken by producing a feed free of salmonella. This would certainly help; however, the attack must be made in all quarters if success is to be achieved.

What kinds of things should we be doing about this complex animal and human health problem?

First, we must investigate the trouble areas. This must be done by trained epidemiologists. In outbreaks where no work of this kind is done, I seriously question whether the high cost of salmonella serotyping is justified. A more simple laboratory confirmation could be sufficient.

Frequency of Serotypes

We need to study the frequent appearance of some serotypes over others. For example, S. typhimurium constitutes about 20 per cent of the recoveries from animals and birds. We need better methods for isolation of the organism from feeds, animals and the environment. We need better understanding of the resistance of these organisms to physical and chemical agents. We need to develop good tests for the detection of salmonella antibodies in all species. For example, cattle do not have significant titers to the "O" antigen while titers to the "H" or Flagellar antigens are usually found. We need to check other areas of possible contamination between the rendering plant the consumer, i. e., wholesalers, mixers, feed companies, haulers, and on-thefarm storage. We must find methods that may be used to sterilize feeds if this is found necessary.

In closing, salmonellosis is an important, worldwide problem involving man, all species of wild and domestic animals and fowl. With few exceptions, serotypes are not host specific, and cross infections are frequent. Carriers exist in most species including man. No species are free of the disease. Many animal feeds are known to contain the organisms. Transmission is often due to ingestion of fecal-contaminated food or water, but infection by contact at collection point is frequent and a serious problem. Control by sanitation, rodent control, and protection against contamination of feeds appears to be the answer to the problem. Improved serologic methods of detecting carriers are badly needed. Serologic typing where no use is made of the information does not appear to be warranted.

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(Continued on page 205)

Pruritis Ani

By WILL H. HOHM, M.D./GENEVA

Pruritus ani designates a symptom complex and not a diagnosis. The purpose of this communication is to discuss the etiology, diagnosis, and treatment of this annoying and common symptom. The etiological classification that follows is an adaptation of that outlined by Nesselrod¹ and Jackman.²

Systemic Causes Diabetes Mellitus Jaundice Local Causes Non-Surgical **Pinworms** Contact Dermatitis **Psoriasis** Mycotic Infections Poor Anal Hygiene Condylomata Acuminata Surgical Prolapsing Hypertrophied Anal Prolapsing Internal Hemorrhoids Perianal Skin Tags Fistula Fissure Pilonidal Sinus Idiopathic Pruritus Ani

By the time the physician sees the patient, it may be impossible to accurately categorize the etiology. Percentages of patients falling into each group are, therefore, inaccurate. An originally local lesion may soon become associated with much functional overlay so that the local problem is no longer apparent. A careful history is of utmost value in the accurate determination of the etiology of pruritus ani.

Systemic Causes

Very few patients with systemic illnesses present with the main complaint of pruri-

Dr. Hohm is attending physician in gastroenterology (Proctology) at Cook County Hospital, Chicago, and clinical instructor in The Department of Medicine, Stritch School of Medicine, Loyola University, Chicago. tus ani. If pruritus is associated with sys temic disease, it is usually generalized.

Diabetes Mellitus—Patients with diabetes mellitus rarely present with the main complaint of pruritus ani. Anal pruritus is usually secondary to monilial vulvovaginitis. The hazard of treating pruritus ani without diagnosing the underlying condition is apparent. Treatment is aimed at systemic treatment of the diabetes and topical treatment of the moniliasis.

Jaundice—The possibility of pruritus ani being primarily an abnormality of bilirubin metabolism was proposed by Gerendasy and Gorsch³ who reported that a large percentage of patients with rectal conditions had an abnormally high icterus index. Their findings have not been substantiated. Vogel⁴ studied the biliary chemistry in 82 patients with pruritus ani and concluded that his study was a "record of negative results" in that no abnormalities of bilirubin metabolism were found. That certain types of jaundice are associated with generalized pruritus is well known. It is not within the scope of this paper to discuss the diagnosis and treatment of jaundice.

Local Causes

The local conditions giving rise to pruritus ani may be conveniently, although not entirely accurately, divided into non-surgical and surgical.

Non-Surgical—The non-surgical conditions to consider are pinworms, contact dermatitis, psoriasis, mycotic infections, poor anal hygiene, and condylomata acuminata. The last may also be a surgical condition on occasion.

Pinworms—When children are troubled with pruritus ani, pinworms must be high on the list as the causative agent. Pinworms are an infrequent cause in adults but must always be considered in the differential diagnosis.

The parent often makes the diagnosis by observing the parasite perianally or on the outside of the stool. Occasionally the parasite may be seen on proctoscopic examination at which time it appears like a fine piece of cotton thread approximately ¾ inch long. The Scotch Tape Paddle (C.R. Bard, Inc., Murray Hill, N. J.) provides a simple and reliable method of diagnosis. The patient is instructed to bathe in the evening and to apply the paddle perianally immediately in the morning before a bowel movement.

Treatment consists of piperazine (Antepar) or pyrvinium pamoate (Povan). The dosages may be found in the Professional Products Information. It must be remembered that enterobiasis is an infection that usually involves other members of the family and playmates, and therapy must be directed toward the group. The simple measures of scrupulous personal hygiene and washing of all bed linens should also be instituted.

Contact Dermatitis—The history should include questions regarding a change in soap, type of underclothing worn, or a change in brand of toilet paper. A history of such a change may not be easy to elicit because rarely does the patient associate his pruritic symptoms with a local inciting agent. If pruritus follows a change in soap or toilet paper, the patient is frequently inclined to believe that the pruritus is due to poor anal hygiene. He then uses the irritating agent more vigorously than before, perpetuating the problem, and so begins a vicious cycle.

When pruritus ani is thought to be due to contact dermatitis, the specific allergen must be eliminated. The patient is instructed to shower and cleanse the anal and perianal area using only a warm wet wash-cloth and a mild non-allergic soap. Toilet paper should be replaced by Tucks medicated discs (Fuller Pharmaceutical Co., Minneapolis) when it appears to be related to the pruritus problem.

Psoriasis—The possibility of psoriasis as the cause of pruritus ani should be kept in mind. The diagnosis is not difficult when the patient presents

with psoriatic lesions on other parts of the body. However, if the only lesion is perianally, it may be necessary to perform a biopsy to confirm the diagnosis. Leifer⁵ believes psoriasis is the most common pathologic substrate for chronic and recurrent pruritus ani. This is not the experience of most clinicians who find psoriasis as an etiologic cause important but representing only a small number of those patients who complain of pruritus.

Topical steroids are effective in the treatment of psoriasis. Local injection of triamcinolone diacetate (Aristocort Diacetate Intralesional) has been reported⁶ as highly effective in idiopathic pruritus ani but intralesional steroid therapy in perianal psoriasis has not been reported. It would seem that it would be effective.

Mycotic Infections—Infection of the skin of the anal region with fungi (epidermophyton and trichophyton) or yeasts (candida albicans) may produce pruritus ani. Fungus infections are relatively uncommon whereas perianal moniliasis is quite common following broad spectrum antibiotic therapy.

The diagnosis is most often made by his-The administration of antibiotic therapy prior to the onset of pruritus ani must be elicited by the physician because the patient frequently has not associated the medication with his malady. Findings on physical examination are usually nonspecific. The specific findings are nearly always obscured by excoriations and secondary changes. However, if seen early in the course of the infection, the lateral erythematous advancing border is very definite. Candida often has advancing satellite lesions. Perianal mycosis may be secondary. It is important to inspect between the toes or look for tinea cruris when a fungus infection is suspected. Vaginal moniliasis is often the precursor of anal moniliasis.

Scrapings for mycoses placed on Sabourgud's media are more academic than practical. The patient needs definitive treatment long before the results of cultures are known. Therefore, the treatment of perianal mycosis infection is begun when the diagnosis is made on clinical grounds and scrapings have been taken.

The treatment is simple and gratifying.

Sporostacin lotion is ideal for local application. Hydrocortisone ointment 1% may be added as adjuvant therapy to hasten relief of the acute inflammation. Iodochlorhydrocyquin and hydrocortisone (Vioforn-Hydrocortisone) is a highly effective fungicidal agent but the high concentration of iodine may prove irritating to sensitized skin. Nystatin (Mycostatin) 500,000 units-t.i.d. should be given if anoscopic and proctoscopic examination shows rectal and colonic involvement.

Poor Anal Hygiene—The irritant role of feces on the skin and the relationship of fecal contamination to pruritus ani has been demonstrated by Caplan.⁷ Approximately half of his experimental subjects had pruritus after deliberate soiling of the perianal skin. Clean perianal skin is doubly important if topical steroids are applied so that fecal material is not rubbed into the already dermatitic area.

Gentleness in cleansing is mandatory. Excessive scrubbing and washing with harsh soaps and coarse washcloths perpetuates the pruritus. Toilet paper moistened with warm water is much less abrasive than dry paper. Medicated moist discs (Tucks) are the most convenient and certain means of adequate cleansing particularly in the patient with acute pruritus.

Condylomata Acuminata—These are papillomata of the anal canal and perianal skin thought to be of viral etiology. Symptoms develop as a result of the disagreeable odor, discharge, and bleeding as the warts become macerated and are rubbed. They may be confused with condylomata lata of secondary syphilis which are flatter and smoother. Other manifestations of syphilis may be present. Dark field examination of the discharge is diagnostic. Squamous cell carcinoma of the anus may mimic condylomata acuminata but it is firm and can be easily differentiated on biopsy.

Medical treatment in the form of podophyllin frequently effects a dramatic cure. Talcum powder is applied to the normal adjacent skin. Podophyllin (25%) in tincture of benzoin is accurately applied to the warts, care being taken to avoid getting any of this highly irritating medication on the normal skin.8 The podophyllin is washed

off in two hours. In four days there should be some blanching and shriveling and no further treatment may be indicated. If there are no results in four days, the podophyllin may be reapplied and left on three hours. Some warts do not respond to podophyllin and need to be excised and the base cauterized. Podophyllin cannot be used for the treatment of warts in the anal canal because of the apposing anal walls. These need to be excised.

Surgical Conditions—The chief complaint of the patient with pruritus ani is frequently "itching hemorrhoids." The physician must not hastily conclude that the presence of a minor abnormality and pruritus represent cause and effect. It is important that the patient understands that a surgical procedure is not a panacea for his symptoms although it may be helpful. Surgical conditions of the anus contribute variably to the problem of pruritus.6 The details of surgical procedures is beyond the scope of this paper and it is intended herein only to draw attention to certain anal conditions which may be associated with pruritus ani.

Proctosigmoidoscopic examination should precede all anorectal surgery but is especially important in patients who have surgical anal lesions associated with mucoid and bloody discharges. Examination may reveal an unsuspected chronic ulcerative colitis, granumomatous colitis, rectal polyp, carcinoma, or villous adenoma. The implications of such findings are self evident.

Prolapsing Hypertrophied Anal Papillae, Prolapsing Internal Hemorrhoids, Perianal Skin Tags, Fistula, Fissure, and Pilonidal Sinus—These conditions cause or aggravate pruritus by keeping the skin moist with mucoid and/or fecal discharges and by interfering with proper cleansing. Surgical procedures which correct these problems and leave a smooth anal canal and perianal region should be carried out and the patient will at least be better able to control the pruritus.

Post Surgical Deformities—An improperly performed amputative hemorrhoidectomy in which the anastomosis between the rectal mucosa and the squamous epithelium is too distal results in a wet anus. This is in essence

a perineal colostomy with a sphincter. It should be surgically repaired. The S-plasty technique devised by Ferguson9 is an ingenious and effective method of correcting this difficult problem. Lesser degrees of ectropion involving only a portion of the anal canal also keep the anal region moist and should be excised or fulgurated.

Injury to the sphincter musculature with fistula surgery may result in ineffective closure and subsequent mucoid and fecal contamination. If possible a plastic repair should be performed. Unfortunately, such a

repair frequently cannot be done.

Idiopathic Pruritus Ani

This is a diagnosis made by exclusion of known etiological factors. Most likely many of the patients with this diagnosis originally began to have pruritic symptoms due to one of the afore discussed causes. By the time the symptoms have become so annoying that the patient consults the physician, secondary changes of maceration, excoriation, lichenification, and inflammation are present making an accurate diagnosis of the initial factor impossible. However, a defense can be made of the theory that idiopathic pruritus ani is basically psychogenic or functional in origin. Clinically one gets the impression that these patients are afflicted with a higher incidence of nervousness, migraine headaches, irritable bowel syndromes, and other functionally related problems than the general population. Which is cause and which is effect is not clear. The treatment of idiopathic pruritus ani will be discussed below.

Treatment

The treatment of pruritus ani is aimed at the alleviation of the distracting symptom. Whenever possible, an exact etiological diagnosis should be made and specific therapy instituted. However, even if an exact diagnosis can be made, the secondary changes are frequently so marked that adjuvant therapy is necessary to interrupt the vicious cycle. The treatment of pruritus ani due to a specific cause is most often the same as that for idiopathic pruritus ani plus specific therapy. The outline that follows serves as a guide for treatment of specific and idiopathic pruritus ani.

Specific Treatment-These modalities have been adequately discussed under the individual headings.

Ancillary Treatment-As indicated above ancillary treatment is usually necessary even when a primary cause for the pruritus is found.

Reassurance—The patient with pruritis ani often has an unspoken fear of cancer or other serious illness. Simple reassurance may markedly alleviate his symptoms. Adequate diagnostic studies including proctoscopic examination must have been performed so that the physician may honestly reassure the patient.

Anal Cleanliness-The methods of accomplishing this have been discussed under the heading Poor Anal Hygiene.

Topical Steroids-The topical use of steroid ointments and cremes is of great value. The patient should be instructed to apply the medication twice daily after cleansing the anal area with a moist soft washcloth or Tucks so as not to rub feces into an already inflamed area. By using a finger cot and gently rubbing the anal area with the medication for a half minute the patient can be certain that the medication has gotten into the cracks and crevices. As symptoms subside this treatment can be decreased in its frequency. Some individuals with chronic pruritus have good symtomatic relief with one application every two or three days.

Trimeprazine Tartrate- Trimeprazine tartrate (Temaril is a phenothiazine derivative with a specific antipruritic effect helpful in the treatment of pruritus ani.10 It is effective in interrupting the pruritic cycle. The usual dose is 2.5 mg. q. i. d. but in patients in whom nocturnal pruritus is marked a 5 mg. spansule capsule at bedtime will help the patient get an uninterrupted night's sleep.

Dietetic Measures—The only dietary measures indicated are the avoidance of foods which aggravate the pruritus or to which the patient has a known allergy. Highly seasoned foods, seafoods, and strawberries are examples of such foods. Malt soup extract (Maltsupex) is highly regarded by Brooks¹¹ as effective treatment. It is said to promote growth of aciduric intestinal flora and the proponents claim that pruritus ani is frequently

due to an alkalotic intestinal tract. It is of particular value in the constipated patient and softens stools and has a mild laxative action due to its high maltose content.

Surgical Treatment-This section will be limited to surgery for intractable pruritus ani and will not include

primarily surgical conditions.

(Alcohol Injection)—The injection of alcohol for pruritus ani should not be undertaken lightly. Necrosis of the skin and sloughing may occur and the patient should be warned of this possibility. Long term results are unpredictable. Alcohol is extremely irritating and a general anesthetic is necessary. Strict asepsis is necessary. The technique is described in standard textbooks of proctology.12, 13

(Ball's Operation)—Bilateral semielliptical incisions are made in the perianal skin leaving narrow strips of intact skin anteriorly and posteriorly.

The skin is dissected free medially, anteriorly, and posteriorly up to the dentate line so that it is free circumferentually. The long term results from this procedure are variable and often very poor.

(Excision and Grafting)-Excision of the perianal lichenified skin and immediate or delayed skin grafting has been advocated by Hughes.4 The value of this procedure will have to await further evaluation.

SUMMARY

Pruritus ani is frequently a frustrating medical problem taxing to the utmost the physician's diagnostic ability. These patients may present serious therapeutic problems. The gratification of a patient relieved from severe pruritus ani is surpassed by few other conditions. Determination of the primary cause with appropriate treatment is important; however, adjuvant therapy is usually necessary.

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Aspirin Is Most Useful Drug For Rheumatoid Arthritis

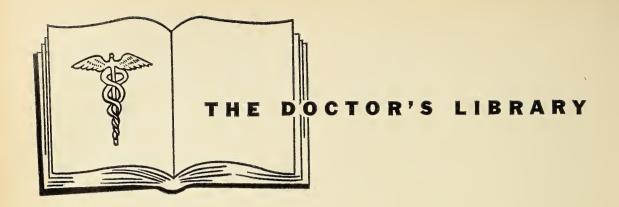
Aspirin has been cited as the most useful drug known in the treatment of the nation's number one crippler-rheumatoid arthritis —by one of the country's leading authorities in the arthritic field.

Dr. John L. Decker, chief of the arthritis and rheumatism branch of the National Institute of Arthritis and Metabolic Diseases (NIAMD), makes this observation in a report on research findings concerning the disabling disease in the American Medical Association's publication, Today's Health.

"Since rheumatoid arthritis is usually chronic, lasting years or a lifetime, toxic drugs are avoided as far as possible," Dr. Decker reports. "The patient is started on large doses of aspirin. Scoffed at by some because it is inexpensive and doesn't require a prescription, aspirin is the most useful drug in the treatment of rheumatoid arthritis, and was originally developed for the specific purpose of treating the disease."

Dr. Decker reports further that "NIAMDsupported studies have shown that the ef-

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HEARTS—THEIR LONG FOLLOW-UP. Paul Dudley White, M. D., and Helen Donovan. W. B. Saunders Company, Philadelphia and London, 1967. 357 pages, 63 illustrations and an impressive bibliography.

Through this excellent book the physician can share the long follow-ups of numerous patients with cardiovascular disease. Dr. Paul Dudley White was a young man when he was appointed head of a new cardiac department at Massachusetts General Hospital. Two normal electrocardiograms are presented of a man without evidence of heart disease taken 50 years apart. This is only one of 86 cases followed for many decades; the majority had serious cardiac problems and were lucky to survive. Examples include the frail 9-year-old boy with a murmur who appeared as a husky man without a murmur 35 years later; hypertension for 33 years under reasonable control; patency of the ductus arteriosus at age 90; a grade 5 murmur still present

45 years later; rejection for insurance at age 48 with survival for 40 years; syphilitic aortic regurgitation discovered at age 42 and unchanged for 30 years; a hopeless case of hypertensive heart failure in good health 20 years later, mycardial infarction at age 52-death from pneumonia at age 90-with good health in between.

Others include over 60 years of paroxysmal tachycardia; 50 years of complete heart block; and bundle block for 40 years. Dr. White tells of receiving annual turkeys for 23 years as payment for a good prognosis in the case of a farmer with coronary thrombosis in the 1920's. Also reported is a centenarian who developed stasis edema following a prolonged respiratory infection. He was 103 years old when he consulted Dr. White who advised him to take long walks. The leg muscles pumped away all the swelling and the man died at the age of 107½ from pneumonia.

T. R. Van Dellen, M.D. Editor

Cytomegalovirus Infections

Klemola and Kaariainen (1965) reported from Finland five cases of "glandular fever" in which there were atypical mononuclear cells in the blood, negative results in heterophil antibody tests and a rising titre of complement-fixing antibody to cytomegalovirus. A further case was reported from the United Kingdom by Anderson and Stern (1966). Kaariainen, Klemola and Paloheimo (1966) and Horton (1966) later reported the finding of a rising titre of cytomegalovirus complement-fixing antibody in six patients with the same syndrome developing some weeks after blood transfusion. In one case it followed simple transfusion of fresh blood, and in five it followed heart surgery with or without extracorporeal circulation. A somewhat similar case in which the syndrome followed simple transfusion was encountered in Sydney in May, 1966. The Medical Journal of Australia (March 18) 1967.

Hospitals, Chaplains and Medical Personnel

By PASTOR MALCOLM B. BALLINGER/WILKINSON, IND.

While no religious or spiritual ministration is required professionally of a doctor or nurse, there are times when to ignore a patient's religious background, his relationship to God or his desire for a religious ministry is to shun the total personality, the whole patient.

In the United States, there are three major religious faiths: Roman Catholic, Protestant, and Jewish. Our belief in freedom of religion for each individual means that we allow each person to worship according to the dictates of his own conscience, and we respect and tolerate his choice.

Our practice is to provide each person with the opportunity to receive the ministrations of his own faith in such a way and on such occasions as the faith of which he is a member requires or which he himself may desire. At no time ought we impose our own religious beliefs or practices on another.

In the hospital the therapy team includes all who are actively engaged in promoting the health and welfare of the patient. This includes, among others, doctors, the nurse, administrator, dietitian, social service worker, occupational therapist, physical therapist, psychologist, psychiatrist, teacher, laboratory technician, chaplain, others who work with patients.

Each member of the team has a particular function to perform, somewhat unique and yet somewhat similiar to what each of the others performs. The patient and his welfare should have top priority; all members of the team must work together and help one another toward the common goal

Pastor Ballinger is the former chaplain and director of clinical pastoral training at the University of Michigan Medical Center, Ann Arbor. This article is reprinted from his manual, "Religious Care for Hospital Patients.©" He is now pastor of the Methodist Church in Wilkinson, Ind. of the welfare of the patient. No one member should be exalted nor encroach upon the function of the others.

The patient and all members of the team look to the doctor as the captain of the team. He is in charge of the program and determines what each of the others are to do. The patient is likely to look up to him almost as a diety who determines life or death for him. There is usually a feeling of awe or reverence for the doctor on the part of the patient, and certainly an attitude of respect and deference on the part of the health team members.

The patient usually regards the nurse as the person closest to him. She is a sort of mother-substitute, for she feeds, bathes, gives morning care, has charge of elimination, administers medications, supports him in weakness, is a friend during loneliness, a sharer of his confidences.

The chaplain may be regarded by the patient as a combination of doctor and nurse. The chaplain or clergyman is considered to be the representative of God, hence there is the feeling of awe or reverence for him. He also represents feelings associated with Mother, such as love, understanding, care, forgiveness, confidence, security.

Here is how the chaplain ministers to the patient:

1. The chaplain represents to the patient whatever his religion represents to him. This usually means God's concern and care for each individual person. The chaplain brings the fellowship of One who cares personally. This fellowship of concern helps combat the lonesomeness of the patient in the strangeness of the hospital environment. The chaplain promotes faith and trust in God and in the hospital per-

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Ladies' Magazine Reports Physicians Changing Attitude Toward 'The Pill'

Forty percent of obstetricians and gynecologists responding to a survey by Ladies' Home Journal believe that women should not take oral contraceptives longer than four years.

Of 2,515 doctors certified by the American Board of Obstetricians and Gynecologists who were surveyed by the magazine, 19 percent try to persuade women to use other birth-control methods, and 10 percent said their attitude toward the pill had become less favorable in the last year or two.

In the same issue, the U. S. Food and Drug Administration's advisory committee admitted it lifted the four-year limit on prescribing oral contraceptives in 1966 in order to avoid a black market, although members were still uncertain of the pill's long term effects.

"We knew the four-year limit was unenforceable, like Prohibition," Dr. Louis Hellman of New York, chairman of the F.D.A.'s advisory committee said in the July issue of the magazine. "We thought it wiser to remove the limitation than to let a lot of black market distribution develop."

Dr. Louis Lasagna, associate professor at the Johns Hopkins University School of Medicine said in the article, "When the pills were put on the market in 1960, all we knew about them was that most women can take them without dropping dead. Today, seven years later, we don't know much more."

"Underreporting" by doctors and hospitals of serious and perhaps fatal reactions to the pill, and difficulties in diagnosing adverse reactions are two of the problems faced by researchers, the Journal found.

"Perhaps the greatest deterrent to candid reporting of reactions is fear, plain, craven fear," Lois R. Chevalier and Leonard Cohen, authors of the Journal article, observed. "The spectre of a malpractice suit is probably the main reason why the F.D.A. has been forced to admit that probably only one in ten adverse reactions ever gets recorded. Even if the 50 state legislatures passed laws requiring doctors to report adverse reactions, it would be difficult to enforce."

But 89 percent of the doctors responding to the Ladies' Home Journal survey said most young married women expected a prescription for the pill, and almost every doctor in the survey prescribes the pill under some circumstances.

Six million American women are taking the pill, "because their demand for it is so strong that their own doctors, the medical profession in general, and possibly even the Federal Government do not dare to try to forbid the medication," the Journal stated.

The British Medical Research Council has warned England's doctors that a woman taking the pill triples her chances of thromboembolism (blood clots), the Journal noted. The U. S. Food and Drug Administration admits that oral contraceptives affect the liver, the pituitary gland, and metabolism, the article stated.

Despite their concern for the long-term safety of the pill, 85 percent of the doctors in the Journal survey would prescribe an oral contraceptive for their wives, and 87 percent would approve the pill for a married daughter, the survey disclosed.

Asked to describe their medical opinion of the pill, the doctors replied as follows:

- 1% would not prescribe the pill under any circumstances;
- 7% say "the pill is too risky when other methods of contraception are feasible:"
- 41% believe "there are no harmful effects for women who tolerate the pill;"
- 52% believe there are "minimal risks for most women;"
 - 3% think the pill is "safe as water."

One gynecologist on the F.D.A.'s 1966 advisory committee told the Journal writers that the true dangers of the pill probably will never be evaluated. "Before we could get the evaluation done," he said, "there will be improved means of contraception anyway. The pills will become obsolete and no one will ever know what damage they caused."

University of Illinois Accepts \$714,259 in Grants

The University of Illinois Medical Center Campus in Chicago, accepted an overall total of \$714,259 in research and training grants for the period of May 15 through June 6, 1967. Out of 15 grants listed, 14 grants totaling \$709,270, were from the United States Public Health Service. The exception is a \$4,989 grant from the American Cancer Society, Illinois Division, to Dr. Walter Fried.

The funds were allocated as follows: \$667,681, College of Medicine and \$46,578, College of Denistry. The largest single grant \$393,222, was awarded to Dr. Granville A. Bennett, dean and professor of pathology in the College of Medicine by the United States Public Health Service for "Health Professions Educational Improvement Program."

The grants are listed below for the College of Medicine.

The grants are fisted below for the Correge of Medicine.		
Health Professions Educational	\$393,222	Dr. Granville A. Bennett dean, College of Medicine, Chicago
Improvement Program The Efficient Use of Medical Manpower	\$50,764	Dr. George E. Miller director of research in medical education and professor of medicine, Evanston
Health Professions Educational Improvement Program	\$20,524	Dr. Charles E. Richards director, School of Associated Medical Sciences assistant dean, College of Medicine, Chicago
Interaction of Nucleic Acids and Related Models	\$20,560	Dr. Mary S. Hanlon assistant professor biological chemistry, Chicago
Mitochondrial Synthesis and Membrane-Bound Enzymes	\$ 7,835	Dr. Edward Titchener associate professor of biological chemistry, Downers Grove
The Mechanism of the Regulation of the Hematologic Stem Cell Compartment	\$ 4,989	Dr. Walter Fried assistant professor of medicine, Chicago
Study of Pituitary Gonadotrophic Hormones	\$11,223	Dr. Robert J. Ryan associate professor of medicine, Western Springs
Allergy and Immunology	\$64,480	Dr. Sheldon Dray professor and head of the Department of Microbiology, Glencoe
Clinical Nystagmography	\$ 3,970	Dr. Nicholas Torok associate professor of otolaryngology, Chicago
Studies of the Beta C Globulin in Glomerulonephritis	\$18,821	Dr. Samuel P. Gotoff assistant professor of pediatrics, immunology, Glencoe
Neurohumoral Supraspinal Control of Motor Systems	\$19,015	Dr. Thaddeus Marczynski associate professor of pharmacology, Oak Park
Nerve-Ending Particles and Synaptic Vesicles	\$34,215	Dr. Everett W. Maynert professor of pharmacology, Chicago
Studies on Subcellular Fractions of Developing Brain	\$18,063	Dr. Ata A. Abdel-Latif research associate psychiatry, Chicago

for August, 1967

SOCIO ECONOMIC news

A service of the Public Relations and Economics Division

Medical Societies Win Fight for Usual, Customary Fees The determination of ISMS and other state societies to obtain usual and customary fee payment for physician services to beneficiaries of government assistance programs appears to be paying off! Last fall ISMS refused to extend its contract with the Office of Dependents' Medical Care because ODMC insisted on a maximum fee schedule. Other state medical societies followed suit. The result? The Defense Department is now scrapping its fee schedule concept in favor of usual and customary fee payments. According to an ODMC spokesman, usual and customary fees are being honored on physicians' bills retroactive to July 1, 1967.

Chicago Medical Society Drops Physician Panel for Welfare Patients A provision of the Title 19 amendment to the Social Security Act has caused abandonment of a program under which the Chicago Medical Society sought to ensure high quality medical care for public aid recipients. Under the program, the professional qualifications of doctors wishing to treat Cook County public aid patients were verified by the medical society before physicians were added to a "panel" of participating physicians. However, since Title 19 requires that patients have access to two-thirds of the physicians in a state or geographical area, the Illinois Department of Public Aid could not continue to recognize the Cook County panel and still receive federal funds. Consequently, the panel was abolished on July 1. Now, physicians wishing to treat public aid patients need only advise the Medical Services Division of the Cook County Public Aid Department that they want to treat such patients. The division will provide information on billing procedures, payment policies and use of the Drug Manual.

Swank Sees Continuing Rise In Medicare Costs The health bill for Illinois' medically indigent will rise 25 percent to \$125 million by the end of 1968 fiscal year. That's the prediction made by Harold O. Swank, Director of the Illinois Department of Public Aid. Swank said care for the medically indigent cost the state about \$100 million in the fiscal year ending last June 30, but that total will increase since the Public Aid Department must pay higher prices now because of payment schedules and other regulations established by Medicare and Medicaid. He was particularly critical of Medicare's cost reimbursement formula for hospitals. Swank noted that in the year ending June 30, 1966,

Illinois paid nearly \$29 million in hospital bills for the state's needy. That total would have been \$2.7 million higher had the department paid on the basis of cost reimbursement, he said.

Mortgage Insurance Program Available to Group Practices

Physicians in a group practice who can't secure conventional financing for building or remodeling facilities may now qualify for mortgage loan insurance from the Federal Housing Administration. The insurance permits mortgages of up to 90 percent of the value of the building and equipment—but the mortgage cannot exceed \$5 million. A group medical practice seeking the insurance must have five or more fulltime physicians-including at least one general practitioner or internist— and must either have a surgeon or obstetrician on the staff, or have a formal arrangement for patients to obtain these services elsewhere. In addition, staff physicians must share equipment and auxiliary personnel. Local insuring offices of the FHA can provide A Public Information Guide and Handbook which outlines acceptable loan sources and types and terms of financing available.

Predict Steady Rise In Blue Cross Rate

An average increase of 11 percent in each of the next two years in Blue Cross premium rates was predicted by Walter J. McNerney, president of the Blue Cross Association. He said the rates will continue to increase after that, but at a slower rate. McNerney said that by 1970, the average daily cost for a hospital patient could be near \$70, and "Blue Cross rates will have to reflect that rise." He added that other factors affecting Blue Cross rates include admission rates and length of stay. According to McNerney, Blue Cross in 1967 plans to expand benefits to include more coverage of care given in physicians' offices, at home and in nursing homes and extended care facilities.

AHA Sees \$85 Daily Hospital Cost by 1970

While Blue Cross officials were predicting average daily hospital costs of \$70 by 1970, (see above) the American Hospital Association estimates it will be closer to \$85. Dr. Edwin L. Crosby, AHA's executive vice president, pointed out that the Blue Cross estimates for future wage increases among hospital personnel were not as high as the AHA estimates. He said the AHA is allowing for increases in nursing wage costs alone of 29.5 percent.

Financial Facts on Our Senior Citizens

Some interesting statistics on the 18.5 million persons who comprise the older population (65 and over) are found in a new brochure published by HEW's Administration on Aging. For example, the aggregate income of this population segment is estimated to be more than \$40 billion a year—almost triple their total income in 1950—and the income is growing. Nearly all of the aggregate annual income is used for current expenditure, with heaviest dollar outlays going for housing and household operations, food purchases and transportation. About 350,000 elderly couples have incomes of \$10,000 or more, and nearly 940,000 more couples have incomes of from \$5,000 to (Continued on page 206)

Group Disability Insurance

By Marvin Schroder
Illinois State Medical Society
Division of Public Relations and Economics

The American Medical Association, at its annual meeting in June, voted to continue its Group Disability Insurance Program under a new carrier, but with the same benefit and rate structures. The AMA action was taken amidst charges that the program is "actuarilly unsound" and that rate increases and benefit adjustment may be necessary within five years. The controversy over the AMA program has created some confusion and concern among Illinois physicians who are members of the group disability program sponsored by the Illinois State Medical Society. To provide a better understanding of the two programs, the ISMS Division of Public Relations and Economics talked with Dr. Fred Z. White of Peoria, chairman of the ISMS Committee on Medical Economics.

Doctor White, how does the AMA's decision to keep its disability insurance program affect the ISMS disability program?

It doesn't. The two programs are not related in any way, except, of course, that they both provide certain disability benefits.

Do the two programs provide the SAME benefits?

No, the only similarity in benefits is that both cover total disability. That, in fact, is all the AMA program provides—benefits for total disability.

And the ISMS program?

Well, in addition to the total disability benefit, there are medical expense benefits for non-disabling accidental injuries, and lump sum accidental death and dismemberment benefits. In addition, there are optional benefits available to the insured person who is confined to a hospital because of either accident or sickness.



Fred Z. White, M.D.

Then, the AMA program is intended more as supplementary coverage to a more broadly-based disability program?

I think that's a fair summation.

Does the same insurance carrier underwrite both the ISMS and AMA programs?

No. The ISMS program is underwritten by Commercial Insurance Company of New Jersey and the AMA program is underwritten by the Fireman's Fund Insurance Company. I might add that in the first five years of the AMA program, the carrier was Continental Casualty Company.

Why did the AMA change carriers?

Continental Casualty informed AMA that its five-year experience with the program had resulted in losses which exceeded the permissible loss ratio and that

it would be necessary to either reduce benefits or raise premiums if Continental Casualty was to continue as carrier. The Fireman's Fund Company, in its bid to underwrite the program, declared that neither benefit reductions or premium increases were needed to operate the program on an actuarially sound basis.

Did the Fireman's Fund Company guarantee this?

Yes—for a five-year period beginning Sept. 1, 1967.

What has been the experience of the ISMS program?

According to the program's administrator (Parker, Aleshire and Company), the claim experience has been excellent. And that's reflected by the fact that we have retained the same carrier and administrator since the start of the program over 21 years ago.

Even so, is there any prospect of a premium increase or a reduction in benefits?

No—the society has been assured by both the administrator and the underwriting company that the long-range stability of the program is assured. This is because of the excellent claim experience . . . the fact that participation by ISMS members has been very good . . . and the administrator's prompt payment of claims by its office and its Personal Policy Service Department.

In what other ways does the ISMS program differ from the AMA's?

I think they differ in one important area, particularly—and that area has to do with the point at which the insured begins receiving benefits. Under the AMA program, no benefits are payable until total disability from either accident or sickness has lasted for 365 consecutive days. Benefits are then payable for the duration of the total disability. Since many serious illnesses do not cause disability for more than one year but, rather, result in a series of recurrent disabilities, it is possible that no benefits would be payable under the AMA plan, whereas the ISMS plan would pay for these recurrent periods of disability.

When do benefits begin for ISMS plan members?

That depends upon which of the three available plans the physician has selected. Under Plans One and Two, the accidental bodily injury benefits begin with the first day of total disability. The sickness benefits begin with the eighth day of total disability, or from the first day of hospital confinement—whichever occurs first. Under Plan Three, both accident and sickness benefits begin with the 31st day of total disability.

What basic differences are there between the three plans offered by ISMS —other than what you have just described?

Under Plan One, sickness benefits are payable for one year, while under Plan Two sickness benefits are payable for seven years or up to age 72, whichever occurs first. Plan Three will pay sickness benefits up to age 65 regardless of the date disability commenced. If the disability occurs after age 58, it will pay benefits for seven years or up to age 72, whichever occurs first.

For how long are benefits paid if one suffers a disability from accidential bodily injury?

All three plans will pay such benefits for up to five years if the insured is unable to pursue his practice as a physician. The benefits are payable for a lifetime if the insured member is unable to work at any gainful occupation for which he is qualified by education and experience.

Can you give us a comparison of the differences in cost between the AMA and the ISMS programs?

No, I can't. Such a comparison would be meaningless, since both the benefits and the intent of the programs differ.

How can a physician apply for the ISMS sponsored Disability Plan?

By contacting the administrator Parker, Aleshire & Company, directly at 9933 Lawler Ave., Skokie, 60076.

Dr. Lewin Given \$10,387 to Study Breast Cancer

A grant of \$10,387 for the further study of breast cancer has been awarded to medical researcher, Dr. Isaac Lewin, a staff member at Hoktoen Institute of Cook County Hospital.

Director of the Institute, Dr. Samuel J. Hoffman, said the National Institutes of Health in Washington has granted Dr. Lewin a total of \$38,892 for the entire project, "Cooperative Study of Breast Cancer Hormone Therapy." The grant covers a three-month period from December, 1966, to April, 1967.

Dr. Lewin is the principal investigator of a project concerned with the "Effects of Steroid Hormones on Advanced Breast Cancer." He began the project in 1962 when the National Institutes of Health awarded him a five-year grant of \$28,505 to aid victims who suffered from advanced stages of breast cancer.

"So far," Dr. Lewin said, "We've found that 20 to 25 per cent of such patients are known to benefit from steroid hormone therapy."

Dr. Lewin pointed out that "there are a great number of women suffering from this disease whose illness has progressed beyond the stages were they can respond to surgical or radiation therapy."

"The benefits of this treatment are important," he noted, "because it can offer temporary relief from the effects of the disease."

Dr. Lewin emphasized that "a number of patients have experienced relief of pain, increase of appetite, gain in weight and most importantly—tumor growth has been noted to become arrested or even recede in some of the patients."

Patients who entered the project are suffering from advanced stages of breast cancer which have not successfully responded to any other form of treatment. A scientific control method developed by the Cooperative Breast Cancer Groups, is followed, assuring a uniform method of treatment and evaluation.

"This way, the results," Dr. Lewin said, "become more meaningful to careful statistical analysis."

After being selected impartially, patients then receive hormonal treatment by in-

(Continued on page 201)

Tandearil® oxyphenbutazone

Tandearil in Painful Shoulder

Therapeutic Effects: Stiffness and pain may diminish within 2 days, and full mobility may be restored within a week. These effects are obtained with oxyphenbutazone alone or combined with physiotherapy or local hormonal injections. The drug is usually well tolerated and does not affect pituitary-adrenal function or immune response.

Contraindications: Edema; danger of cardiac decompensation; history or symptoms of peptic ulcer; renal, hepatic or cardiac damage; history of drug allergy; history of blood dyscrasia. The drug should not be given when the patient is senile or when other potent drugs are given concurrently.

Warning: If coumarin-type anticoagulants are given simultaneously, watch for excessive increase in prothrombin time. Pyrazole compounds may potentiate the pharmacologic action of sulfonylurea, sulfonamide-type agents and insulin. Carefully observe patients receiving such therapy. Use with great caution in the first trimester of pregnancy.

Precautions: Obtain a detailed history and a complete physical and laboratory examination, including a blood count. The patient should be closely supervised and should be warned to report immediately fever, sore throat, or mouth lesions (symptoms of blood dyscrasia); sudden weight gain (water retention); skin reactions; black or tarry stools or other evidence of intestinal hemorrhage. Make regular blood counts. Discontinue the drug and institute countermeasures if the white count changes significantly, granulocytes decrease, or immature forms appear. Use greater care in the elderly and in hypertensives.

Adverse Reactions: The most common are nausea, edema and drug rash. The drug has been associated with peptic ulcer and may reactivate a latent peptic ulcer. Infrequently, agranulocytosis, or a generalized allergic reaction may occur and require withdrawal of medication. Stomatitis, salivary gland enlargement, vomiting, vertigo and languor may occur. Leukemia and leukemoid reactions have been reported but cannot definitely be attributed to the drug. Thrombocytopenic purpura and aplastic anemia may occur. Confusional states, agitation, headache, blurred vision, optic neuritis and transient hearing loss have been reported, as have hyperglycemia, hepatitis, jaundice, and several cases of anuria and hematuria. With long-term use, reversible thyroid hyperplasia may occur infrequently. Moderate lowering of the red cell count due to hemodilution may occur.

Dosage in Painful Shoulder: 600 mg. daily in divided doses for 2 to 3 days; 300 mg. daily thereafter. Usual duration of therapy: 2 to 7 days.

Availability: Tablets of 100 mg. 6562-VI(B)R

For complete details, please refer to full prescribing information.



Geigy Pharmaceuticals Division of Geigy Chemical Corporation Ardsley, New York

Geigy

Tandearil® oxyphenbutazone

helps painful shoulders move again



Please see adjoining page for brief prescribing summary.

TA-5094PC

3 out of 4 painful shoulder patients responded well

Sperling, I.L.:
Applied Therap. 6:117,
1964

84.2% of 127 patients
Rosenbaum, E.E., and

Schwarz, G.R. Northwest Med. 61:927, 1962. 81% of 48 patients

Illinois Medical Students Studying Abroad

Seventeen students in the College of Medicine at the University of Illinois Medical Center Campus are studying abroad this summer. The students, all seniors, left in June for hospitals and medical schools in Scandinavia, England, Israel, Europe and Africa.

All fourth year medical students in the college are expected to spend one quarter studying some specialty or subject of medical importance. Those choosing to study abroad can make arrangements through the university's foreign student exchange program or through faculty members who communicate with doctors in other countries.

Following three months of study, the returning scholars must write papers presenting their research findings and evaluating their experiences.

Illinois students, their specialty and destination are:

Richard W. Burner, Forest Park, Surgery, King's College Hospital, London; Charles H. Dennis, Paris, Surgery, Guy's Hospital, London; Barry H. Goldberg, Chicago, Neurology, Bispebjerg Hospital,

President's Page

(Continued from page 133)

the society's legislative activities will be as successful in the future as they were in the session just concluded. How?

By personal involvement in the democratic process of selecting and electing political candidates. Certainly, financial support of IMPAC and AMPAC is one important form of involvement. But I cannot overemphasize the desirability—indeed, the necessity-for physicians to be personally active on the grassroots political scene.

Now, permit me a final thought on the legislative session just ended. I know that all members of the ISMS legislative committee join with me in a special "hurrah" to Roger White, James Brady, Mrs. Betty Kararo and Mrs. Gloria Evans. These members of the headquarters staff gave unstintingly of themselves for the welfare of the medical profession and of the public. Their "legislative record" speaks for itself, and its message is a loud "Well done!" Also, a special thanks to Frank Pfeifer, ISMS Legal Counsel, who played a key role as legislative counsel.

Copenhagen; Kermit D. Hoyme, Knoxville, Middlesex Hospital, Surgery, London; Marilyn Ann Hruby, Chicago, Pediatrics, University of London, London; Philip Immesoete, Chicago, Medicine, Africa.

Also David Kuter, Melrose Park, Preventive Medicine and Community Health, Nigeria; James R. Margolis, Chicago, Medicine, Karolinska Institute, Stockholm; Martin Meyerson, Chicago, Neurology, Denmark; Daniel A. Nachtheim, St. Charles, Medicine, Guy's Hospital, London; Paul R. Rice, Elmhurst, Ophthalmology, Zurich; Steven Shellabarger, Surgery, Middlesex Hospital, London; Naomi A. Sidell, Medicine, University of Florence, Florence, Italy; Thomas P. Sloan, Chicago, Surgery, Linz, Austria; Stuart Terry, Chicago, Neurology, University of London, London; Frederick E. Wohlberg, Surgery, Bispebjerg Hospital, Copenhagen, and Suzanne G. Zeilenga, LaGrange, Surgery, Nazareth Hospital, Nazareth, Israel.

Three Etiologies

(Continued from page 159)

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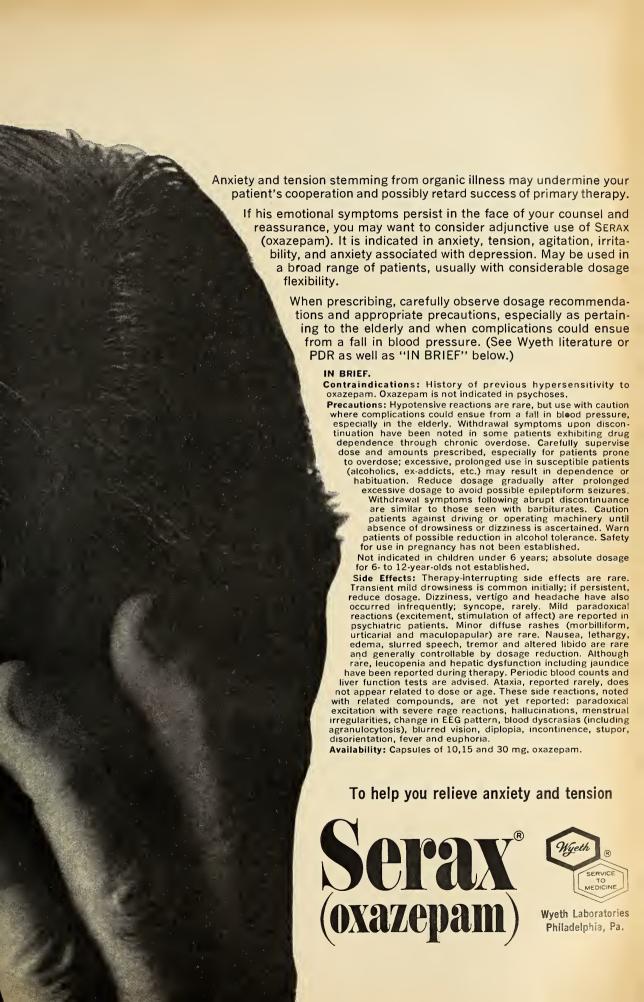
1962.

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 Wolf, B. S., Khilnani, M. T., and Lautkin, A.: Diagnostic Roentgenology of Digestive Tract without Contrast Media. J. Mt. Sinai Hosp. 27: 101–1960. 101, 1960.

Family Planning

(Continued from page 172)

and 24 clinic sessions in the community and without publicity except by word of mouth, over 9,600 patients have enrolled in this program since March 8, 1965 through November 30, 1966. Of this number close to 7,000 are still participating, indicating that there is about a 25% drop-out. As our program is voluntary, we do not make home visits to the patient to determine the cause for her dropping from the program. We assume that if she does not return for care that she is no longer interested in the service we have to offer at our clinic.





After the picnic even Gramps Was a victim of intestinal cramps

Parepectolin for quick relief of acute diarrhea

- ...soothes colicky pain with paregoric*
- ... consolidates fluid stools with pectin
- ... adsorbs irritants with kaolin, and protects intestinal mucosa

In elderly patients it is particularly important to stop the diarrhea fast. Parepectolin helps you control diarrhea promptly and gain the patient's confidence until etiology has been determined.



Each fluid ounce of creamy white suspension contains:

*Paregoric (equivalent) (1.0 dram) 3.7 ml.

Contains opium (¼ grain) 15 mg. per fluid

ounce.

warning: may be habit forming

Usual Adult Dose: One or two tablespoonfuls three times daily.



WILLIAM H. RORER, INC.

Fort Washington, Pa.

Chicago Agencies Form Local Blood Council

Formation of the Metropolitan Chicago Blood Council to serve as a clearing house for information on blood banking in the Chicago area was announced recently by its chairman, Dr. James B. Hartney.

The council—chartered under the State of Illinois non-profit corporation act—will "provide coordination and leadership through research and educational training," Hartney explained. "It will not operate a blood bank but will service existing blood procurement agencies," he added.

Dr. Hartney of Elmhurst is Director of Laboratories at St. Anne's Hospital in Chicago. He has been chairman of the ISMS Committee on Laboratory Evaluation and was recently elected to the society's Board of Trustees.

Dr. Hartney said that sponsoring organizations currently represented on the council arc: The Chicago Medical Society, Chicago Hospital Council and the Mid-America Chapter of the American Red Cross. "But we are hoping that all agencies concerned with the activity of blood donation will eventually become members," he declared.

In addition to its educational and research functions the council has been established to:

- 1. Assist in blood donor recruitment.
- 2. Provide an exchange of blood inventory information.
- 3. Receive bequests, grants and contributions for the advancement of blood banking.
- 4. Cooperate with sponsoring and community organizations to help meet community blood needs in the best possible manner.
- 5. To carry on educational programs and research in blood banking and related areas.

The original Board of Directors of the Metropolitan Chicago Blood Council (in addition to Hartney) includes Drs. James E. Bowman, Walter A. Rambach of the Mid-America Chapter of A.R.C.; Charles R. Goulet and Howard F. Cook of Chicago Hospital Council, and Dr. Douglas W. Huestis of Chicago Medical Society. Office location and staff have not yet been chosen, however, the office will probably be located in or near Chicago's loop, Hartney said.

Suggestions and recommendations for the Blood Council may be directed to Dr. Hartney at 410 Lake St., Oak Park, 60302.



GE: One capsule on arising or at breakfast. Drugs are released ally over 6 to 8 hours, providing therapeutic effect for 10 to 12

CATIONS: AMODEX Timed Capsules elevate the mood, relieve per-

CATIONS: AMODEX Timed Capsules elevate the mood, relieve nertension, restore emotional stability and emotional capacity for cal and mental effort. AMODEX Timed Capsules are extremely used the treatment of anxiety states and may be used to control ite in the management of the obese patient — without nervous attom.

SIDE EFFECTS AND PRECAUTIONS: Frequent or continued use may cause nervousness, sleeplessness, or restlessness. Individuals suffering from high blood pressure, heart disease, diabetes, thyroid disease, lung ailments, or kidney disorders should not take this product. It should not be taken over a long period of time.

CONTRAINDICATIONS: Hyperexcitability, agitated pre-psychotic states. Sensitivity to Amphetamines or Barbiturates.

CAUTION: Federal Law prohibits dispensing without prescription. SUPPLIED: In bottles of 30, 100, and 1000 capsules.

Fellows Testagar

DIVISION OF FELLOWS MEDICAL MFG. CO., INC. pharmaceuticals since 1866

Detroit, Michigan



THE VIEW BOX-



Fig. 1



Fig. 2

THE VIEW BOX

By LEON LOVE, M.D.
Director, Department of
Diagnostic Radiology,
Cook County Hospital;
Associate Professor of Radiology,
Chicago Medical School

This patient entered Cook County Hospital and it was noted that he appeared physically and mentally retarded. His parents and siblings were all of normal stature and mental development.

What's your diagnosis?

1) Anchondroplasia

- 2) Epiphyseal Dysplasia (Fairbank's Syndrome)
- 3) Cretinism

4) Morquio's Disease

(Answer on page 206)

Dr. Lewin

(Continued from page 190)

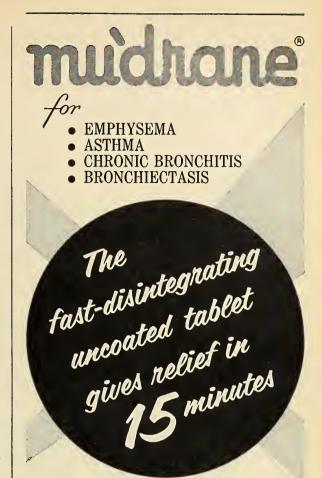
tramuscular injections. All patients are then thoroughly examined and evaluated by means of x-ray studies and chemical tests prior to their treatment. After this, they are examined frequently, at intervals of four weeks, or more often, depending upon the stage of their illness.

"All of the patients are most gratified to see that some treatment is being attempted for their advancing disease," Dr. Lewin said.

"We are hopeful that these new drugs and treatment techniques will add comfort and many years to the lives of these patients."

Hektoen Institute of Cook County Hospital was founded in 1943 by a group of well-known physicians and public-spirited citizens. It is a non-profit organization. A staff of 170 medical research scientists and 180 laboratory technicians are pursuing many paths of research at the center.

"The Mechanisms of Action of the Oral Contraceptives" is the title of a new, 30-minute color, sound film now available from the AMA's Film Section. It involves a discussion of the effects of both combination and sequential oral contraceptives on the anterior pituitary, endometrium and the cervix.



Each tablet contains:

Bach tactet contains:	
Potassium Iodide	ζ.
Aminophylline130 mg	ζ.
Phenobarbital, Caution: May be habit forming 21 mg	ζ.
Ephedrine HCl 16 mg	ζ.

FEDERAL LAW PROHIBITS
DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

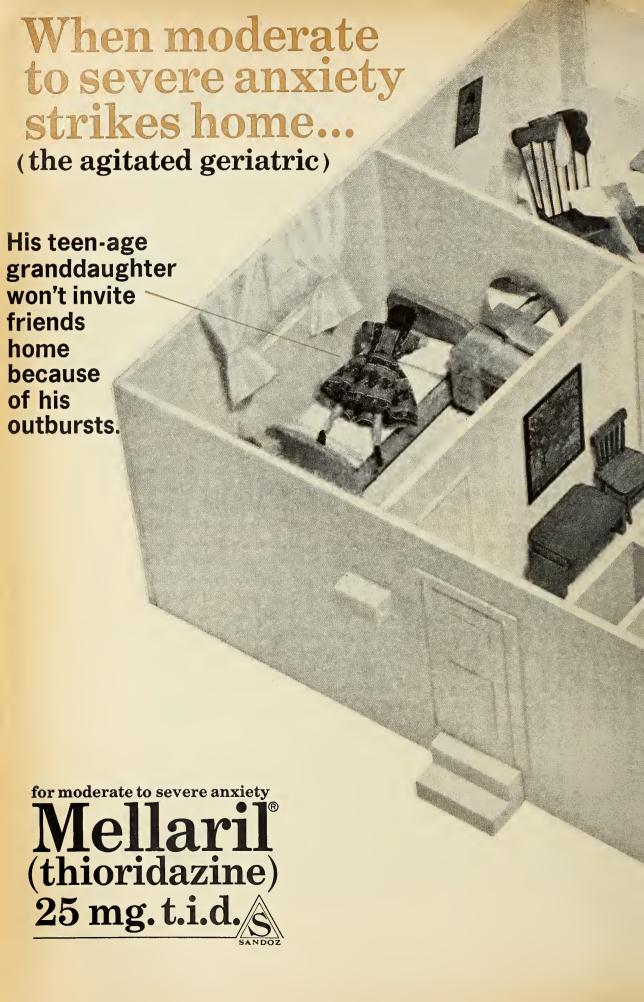
Dispensed in bottles of 100 and 1000 tablets.

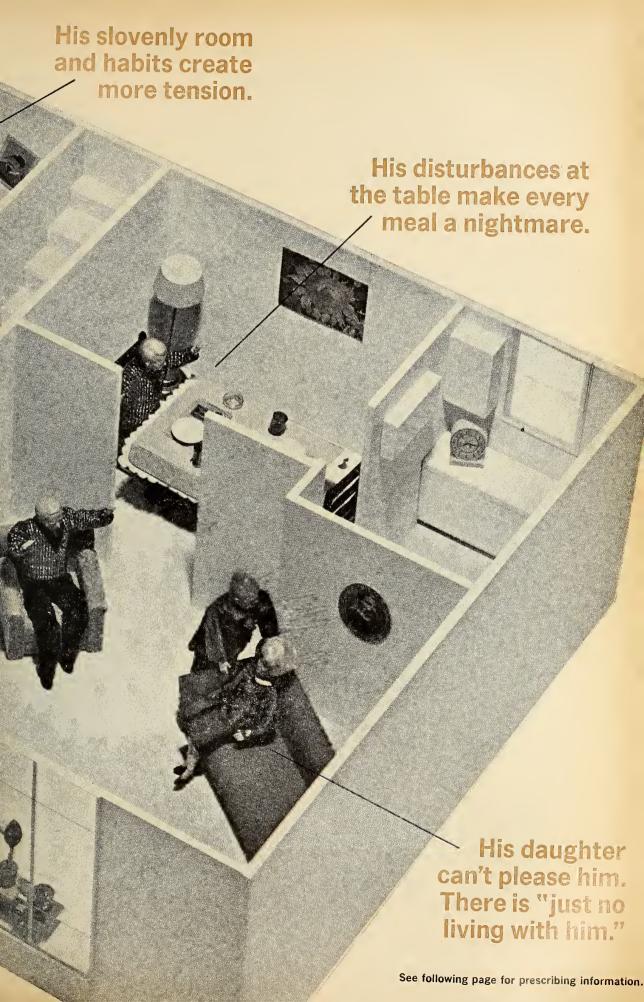
MUDRANE GG—Formula, dosage and package identical to Mudranc—except—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC. RICHMOND, VIRGINIA 23217 Manufacturers of ethical pharmaceuticals since 1856







When moderate to severe anxiety strikes home...

Anxiety that seriously interferes with the individual's performance at work, at home, or in the community may be regarded as moderate to severe in degree.

Mellaril often recommends itself to the treatment of moderate to severe anxiety because it

- helps control the most frequent symptoms: marked tension, agitation, apprehension, restlessness, hypermotility
- · often alleviates anxiety-induced somatic complaints
- · frequently helps strengthen emotional resources
- helps the patient maintain realistic contact with environment, closer harmony with family

Thus, when you consider the anxiety moderate to severe . . . consider Mellaril.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.

Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recom-mended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.

Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.

Before prescribing, see package insert for full product information.

for moderate to severe anxiety

(thioridazine) 25 mg. t.i.d.



NEW **PHARMACEUTICAL SPECIALTIES**

by Paul deHaen

For detailed information regarding indications, dosage, contraindications and adverse reactions, refer to the manufacturer's package insert or brochure.

Single Chemicals-Drugs not previously known,

including new salts.

Duplicate Single Products—Drugs marketed by

more than one manufacturer.

Combination Products—Drugs consisting of two or more active ingredients.

New Dosage Forms-Of a previously introduced product.

NEW SINGLE CHEMICALS

CHOLOXIN Cholesterol-reducing Agent Manufacturer: Flint Laboratories

Nonproprietary Name: Sodium dextrothyroxine Indications: Hypercholesterolemia in euthyroid patients with no evidence of heart disease, and hypothyroidism in patients with cardiac disease who cannot tolerate other types of thyroid medication.

Contraindications: Heart disease, hypertension (other than mild, libile hypertension), advanced liver or kidney disease, during preg-

nancy and lactation, history of iodism.

Dosage: Adults-initial: 1 to 2 mg. daily, to be increased at intervals not less than one month if necessary.

Maintenance: 4 to 8 mg. daily. Children-initial: 0.05 mg/Kg. daily to be increased at monthly intervals if necessary.

Maintenance: 0.1 mg/Kg. daily, maximum 4 mg. daily. Supplied: Tablets-2 and 4 mg.; bottles of 30.

NEW SINGLE CHEMICALS

 \mathbf{R}

HALDOL Ataraxic Manufacturer: McNeil Laboratories Nonproprietary Name: Haloperidol

Indications: Schizophrenia, manic phases of affective reactions, psychotic reactions in adults with organic brain damage and mental defici-

ency, and Gilles de la Tourette's syndrome. Contraindications: In comatose patients, those severely depressed by alcohol or other centrally acting agents, parkinsonism, and children under 12 years.

Maintenance: 1 to 2 mg., 2 or 3 times daily.

Maintenance: 1 to 2 mg., 3 or 4 times daily.

Maximum: 2 to 5 mg., 2 or 3 times daily.

Supplied: Tablets-0.5, 1, and 2 mg.; bottles of 100

PROLIXIN ENANTHATE Ataraxic

and 1000.

Manufacturer: E. R. Squibb & Sons, Inc. Nonproprietary Name: Fluphenazine enanthate Indications: Management of schizophrenia and other psychotic disorders including mania and brain disease.

Contraindications: Suspected or established subcortical brain damage, with or without hypothalamic damage: patients receiving large doses of hypnotics or with a history of convulsive disorders; mitral insufficiency or pheochromocytoma; idiosyncrasy to other centrally acting drugs; comatose or severely de-pressed states; blood dyscrasia, liver damage or renal insufficiency. Not for children under 12 years.

Dr. Rouse Supports Proposed New Specialty of Family Medicine

The new president of the American Medical Association has called on all members of his organization to support the soon-to-be-launched specialty of family medicine.

Dr. Milford O. Rouse, Dallas, Tex., included the charge in his inaugural address to the House of Delegates, the AMA's 224member governing body, at the June session in Atlantic City, N.J.

"The American Board of Family Practice, soon to be launched, will need sympathetic understanding by all of us," Dr. Rouse, a practicing gastroenterologist, said. "We owe it to the new specialists, not only to give them our support during their years of education and resident training, but to help them find the best place to locate and help give them access to hospitals in the communities where they practice."

The plea to assist the new specialty followed a statement that "intelligent, broadminded cooperation will be needed to implement the decision of the AMA to stimulate the training and work of more family physicians."

The move to create a new specialty of

New Pharmaceutical Specialties

(Continued from page 204)

Dosage: 25 mg. i.m. or s.c. every 2 weeks. Dosage should be adjusted individually.

Supplied: Multiple dose vials-5 cc. (25 mg./cc.)

NEW DOSAGE FORMS

HALDOL Ataraxic

Manufacturer: McNeil Laboratories

Manufacturer: McNeil Laboratories

Nonproprietary Name: Haloperidol

Indications: Schizophrenia, manic phases of affective reactions, psychotic reactions in adults with organic brain damage and mental deficiency, and Gilles de la Tourette's syndome.

Contraindications: In comatose patients, those

severely depressed by alcohol or other centrally acting agents, parkinsonism, and children under 12 years.

Dosage: Initial: 1 to 2 mg., 2 or 3 times daily. Maintenance: 1 to 2 mg., 3 or 4 times daily. Maximum: 2 to 5 mg., 2 or 3 times daily. Supplied: Oral solution-2 mg./cc.; bottles of 15

MILTOWN, INTRAMUSCULAR Ataraxic Manufacturer: Wallace Laboratories

Nonproprietary Name: Meprobamate Indications: Adjunct in the treatment of tetanus. Contraindications: Allergic or idiosyncratic reactions to meprobamate, impaired renal function. Not for intravenous use.

Dosage: Must be individualized.

Adults-400 mg. q. 3-4 h. Infants-125 mg. q. 6 h. Supplied: Ampuls-400 mg./5 cc.

family medicine, which is being spearheaded by the American Academy of General Practice, Kansas City-based national association of family doctors, is well under way since the appearance during 1966 of four major reports pointing to the urgent need for many more family-type doctors. One of these, that of the AMA's Ad Hoc Committee on Education for Family Practice, was accepted by the AMA Council on Medical Education and endorsed by the House of Delegates last November.

Dr. Carroll L. Witten of Louisville, Ky., president of the American Academy of General Practice and an AMA delegate, commended the AMA leader's support for the new specialty.

"We are grateful to Dr. Rouse for expressing his recognition of the needs of the American people," Dr. Witten said, "of the need to reorient medical education, and of the need to solve the medical manpower dilemma through production of adequate numbers of well-qualified, well-trained family doctors to provide comprehensive and extensive care."

The new specialty, which will require three years of post-M.D. graduate training before a certification examination may be taken, will feature not only the usual clinical areas of study but preparation in the behavioral sciences and in preventive health care. It will become the 20th primary specialty in medicine.

Salmonella

(Continued from page 176)

(5) Flippin, H. F. and Eisenberg, G. M.: Current

Problems in Salmonellosis. Amer. J. Med. Sci. 239: 278-287, March 1960.

(6) Hardy, A. V. and Galton, M.M.: The Role of Food Processing Plants in Dissemination of Salmonella. Amer. J. Trop. Med. 4: 725-730, July 1955.

(7) Symposium: Epidemiology of Salmonellosis. Public Health Reports, Public Health Service, U. S. Dept. HEW, Vol. 78, No. 12, December 1963.

(8) Personal communication.

(9) Galton, M. M. et al.: Salmonella in Fresh and Smoked Pork Sausage. J. Infect. Dis., 95: 232-235, (1954).

(10) Rothenbacher, H.: Mortality and Morbidity in Calves with Salmonellosis, J. A. V. M. A., Vol. 147, No. 11. Dec. 1965.

Socio-Economic News

(Continued from page 187)

\$10,000. Some 2.6 million couples have incomes under \$3,000. Three out of every 10 persons 65 and older—or slightly more than one million—live in Illinois. They comprise 9.8 percent of the state's total population. By 1985, an estimated 1,309,000 senior citizens will be numbered among Illinois residents.

SSA Studies Ways to Help Elderly

Commenting on the first year of Medicare, Robert M. Ball, Commissioner of Social Security told a press conference that the SSA is studying ways to relieve patients of "the hardship arising from his physician's refusal to take an assignment without increasing inflationary pressures on the size of physicians' fees." He said an analysis shows that about 57 percent of the country's physicians are accepting assignments "at least part of the time."

-Gaylen Lair and Marvin Schroder

Speed 'Reading' for Blind People

Blind people can be trained to understand tape recorded voices when played back at twice the recorded speed. Modifications of conversational recorders developed recently by Medical Electronics Research Institute in Phoenix, Ariz., under contract with the Public Health Service's National Center for Chronic Diseases Control, offer promise of doubling the audio "reading" speed of the visually handicapped.

According to Dr. John W. Hudson, blind Professor of Sociology at Arizona State University in Tempe, who directed the recorder improvements, understanding of the speeded-up speech can be frustrating to beginners. However, he claims that with continued training and experimentation with gradually increased voice playback speed, complete understanding can be achieved.

Dr. Hudson taught himself to understand speech played back at two and one-half times the original recorded speed. The Center's Neurological and Sensory Disease Control Program provided the financial support for developing the electronic device with which the speed of the tape playback can be increased gradually, rather than at the fixed speed intervals of existing recorders.

The significance of continued research into the potential of "speed listening" is accentuated when compared with the "reading" time required by other methods available to the blind. For example, the average Braille reading rate for blind high school students is 90 words per minute as

compared to an average rate of approximately 251 words for sighted high school students. In one approach to the solution of this problem, educators have increasingly used recordings in the education of blind students. By this means, "reading" by ear can proceed at about two-thirds the rate

The View Box

(Continued from page 201)

DIAGNOSIS: Cretinism

I neglected to state that this patient was 15 years of age when he was first seen. His bony development corresponds to a 2-3 year old child. Cretinism is usually caused by a congenital lack of thyroid formation. Skeletal growth is greatly inhibited. The fault appears to be in the conversion of cartilage to bone, i.e., in endochondral bone formation.

Intramembranous bone formation progresses at a normal rate so that eventually the cylindrical bones become disproportionately wide for their subnormal length. The osseous nuclei within the cartilaginous epiphyses are late in appearing so that in mapping the cretin skeleton it appears to be much younger that its chronologic age. Multiple centers may develop instead of a single osseous nucleus and later merge to form an irregular area of opacity. (Fig. 1 & Fig. 2).

The diagnosis should not be difficult since other types of dwarfism are not complicated by changes of myxedema.

References

Orthopedic Diseases by E. Aegerter and J. A. Kirkpatrick pages 395-398, W. B. Saunders Publisher.

1967 ANNUAL CONVENTION

American Medical Writers Association

Thursday to Sunday—September 21, 22, 23, 24, 1967
The Palmer House, Chicago

"Dilemmas In Medical Communication"

THURSDAY, SEPTEMBER 21

9:00 to 12:00 noon 1966/1967 Executive Committee Meeting, Room C, Sixth Floor.

12:00 to 10:00 p.m.

Registration, Sixth Floor Foyer

1:30 to 3:45 p.m. 1966/1967 Board of Directors Meeting, Room B, Sixth Floor.

4:00 to 5:30 p.m.

CONCURRENT COMMITTEE MEETINGS (Sessions open to all members)
Awards—Room A, Sixth Floor
Constitution & Bylaws—Room B,
Sixth Floor
Education—Room C, Sixth Floor

Liaison—Room 779, Seventh Floor Membership—Room 785, Seventh Floor

Publications—Room 786, Seventh Floor Publications—Room 777, Seventh Floor

Fellowship—Room 775, Seventh Floor

Freelance—Room 774, Seventh Floor

6:00 p.m.

Bus to Museum of Science and Industry, Chicago.

6:30 p.m.

Dinner courtesy of the Museum of Science and Industry

7:30 p.m.

Welcoming Remarks:
Daniel M. MacMaster, Director, Museum of Science and Industry.

Introduction:

W. A. D. Anderson, MD., Miami, President, American Medical Writers' Association

Address:

Morris Fishbein, MD., Chicago, Editor, *Medical World News*, "The Evolution of American Medical Journalism"

8:15 p.m.
Guided tours, Museum of Science and
Industry

FRIDAY, SEPTEMBER 22

7:30 to 8:45 a.m. Freelance Writers Du

Freelance Writers Dutch-Treat Breakfast, Room B, Sixth Floor.

8:00 to 5:00 p.m.

Registration, Sixth Floor Foyer

9:00 to 5:00 p.m. Hospitality Room

Hospitality Room, Room A, Sixth Floor.

9:00 to 9:30 a.m.

OPENING REMARKS, Monroe Room, Sixth Floor.

W. A. D. Anderson, MD., Miami, presiding

President, American Medical Writers' Association Introductions: Representative, City of Chicago

H. Kenneth Scatliff, MD., Chicago President, Chicago Chapter, A.M.W.A.

Newton DuPuy, MD., Quincy President, Illinois State Medical Society

Francis W. Young, MD., Chicago President, Chicago Medical Society

Charles G. Roland, MD., Chicago Program Chairman for 1967 Convention





Dr. Masters

Mrs. Johnson

9:30 to 10:15 a.m.

KEYNOTE ADDRESS, Monroe Room, Sixth Floor.

"The Scientist and His Interpreters"
William Howell Masters, MD., Director, Reproductive Biology
Research Foundation, St. Louis,
Missouri

Virginia E. Johnson, Research Associate, Reproductive Biology Research Foundation, St. Louis, Missouri

10:15 to 1:30 a.m.

INTERMISSION Time to visit the exhibits

10:30 to 12:00 noon

PANEL DISCUSSION: "Medical News: A New Departure?", Monroe Room, Sixth Floor.

Presiding Officer: Shirley Motter Linde, MS., Chicago.

Moderator: Frank W. Chappell, Scieuce News Director, AMA, Chicago Discussants:

Dorsey Woodson, Chief, Chicago Bureau, Medical World News. Hal Quarfoth, Science Editor, Modern Medicine, Minneapolis. John P. Connors, Editor, JAMA Medical News, Chicago. Alfred Soffer, MD., Senior Editor, JAMA, Chicago.

12:00 to 12:30 p.m. Cash bar, Adams Room, Sixth Floor.

12:30 to 2:00 p.m.

FELLOWSHIP AWARDS LUNCH-EON, Adams Room, Sixth Floor

W. A. D. Anderson, MD., Miami, President, A.M.W.A., presiding.

Presentation of Candidates: Leslie Lewis, LL.B., Chicago.

ADDRESS: "History of Aztec Medicine"

Ernesto Garcia Herrera, MD., Mexico City,

Past-President, Mexico City Chapter, A.M.W.A.

2:00 to 3:15 p.m.

ROUND TABLE SESSIONS

SESSION 1: "New Methods of Approaching the Literature—MEDLARS Demand Searches and Recurring Bibliographies," Room 779, Seventh Floor.

Moderator: William K. Beatty, Librarian & Professor of Medical Bibliography, Northwestern University Medical School, Chicago.

Discussant:

Leonard Karel, PhD., Special Assistant to the Associate Director, Intramural Programs, National Library of Medicine, Bethesda.

SESSION 2: "Programs for Improving Medical Writing," Monroe Room, Sixth Floor.

Moderator: Charles G. Roland, MD., Senior Editor, JAMA, Chicago.

Discussants:

Lois DeBakey, PhD., Professor of Scientific Communications, Tulane University, New Orleans.

Ruth Good, Department of Physical Medicine and Rehabilitation, University of Michigan, Ann Arbor.

Edward J. Huth, MD., Associate Editor, Annals of Internal Medicine, Philadelphia.

Lester S. King, MD., Senior Editor, JAMA, Chicago.

SESSION 3: "Freelancing Your Medical Writing, Room B, Sixth Floor.

Moderator: Theodore Berland, BS, Freelance Writer, Chicago.

"You Must Be a Salesman"

Discussion: "What the Writer Must Do, What the Editor Expects" Hal Higdon, BA, Freelance Writer, Michigan City, Indiana. Clifford Hicks, BS., Midwest Editor,

Clifford Hicks, BS., Midwest Editor, Popular Mechanics; Editor, Popular Mechanics Encyclopedia; Chicago.

3:15 to 3:30 p.m. INTERMISSION Time to visit the exhibits.

3:30 to 4:45 p.m.

ROUND TABLE SESSIONS

SESSION 4: "Format of the Smaller Journals," Room B, Sixth Floor.

Moderator: Richard L. Reece, MD., Editor, St. Barnabas Medical Staff Bulletin; Board of Editors, Minnesota Medicine; Pathologist, St. Barnabas Hospital, Minneapolis.

Discussants:

W. D. Snively, Jr., MD., Clinical Professor of Pediatrics, University of Alabama; Vice-President, Medical Affairs, Mead Johnson Co., Evansville, Indiana.

"Readability"

Carl Rice, MD., Editor, Minnesota Medicine; Clinical Professor of Surgery, University of Minnesota.

"The State Journal and the General Reader"

George E. Shambaugh, MD., Editor, Archives of Otolaryngology; Professor and Chairman of the Department of Otolaryngology, Northwestern University.

"Bait to Catch the Reader"

SESSION 5: "Public Relations or Federal Relations: The Narrowing Difference," Room 779, Sixth Floor.

Moderator: William K. Stuckey, Science Editor, Department of Public Relations, Northwestern University, Evanston.

Discussants:

Lucius P. Gregg, MS., Associate

Dean of Sciences, Northwestern University, Evanston.

Max Light, BS., Director of Public Information, University of Illinois, Medical Center, Chicago.

Dorsey Woodson, MS, Chief, Chicago Bureau, Medical World News

SESSION 6: "Medical Writer—Reporter? Educator? Crusader?",
Monroe Room, Sixth Floor.

Moderator: William S. Gailmor, Editor, Science and Medicine Publishing Company; National News Editor, Tele-Med, New York.

Discussants:

Ron Kotulak, Science Editor, Chicago Tribune.

"Informing and Motivating the Public"

Allan J. Ryan, MD., Past-President, American College of Sports Medicine; Associate Professor of Surgery and Athletic Teams Physician, University of Wisconsin, Madison.

"The Problem of Motivation for Fitness"

Lewis C. Frank, Jr., Executive Director, Information Center on Population Problems; Executive Editor, Women's Medical News Service, New York.

"Sex and Communications Media"

4:45 to 5:45 p.m.

ANNUAL BUSINESS MEETING, Monroe Room, Sixth Floor.

6:30 to 7:30 p.m.

RECEPTION (Wine tasting, courtesy of Wine Institute of America), Adams Room, Sixth Floor.

7:30 p.m.

AWARDS BANQUET, Adams Room, Sixth Floor.

W. A. D. Anderson, MD., Presiding

Presentation of Honor Awards (Dress Optional)

SATURDAY, SEPTEMBER 23

7:30 to 8:45 a.m. Journal Editors Dutch-Treat Breakfast, Room B, Sixth Floor.

9:00 to 5:00 p.m. Registration, Sixth Floor Foyer

9:00 to 5:00 p.m. Hospitality Room, Room A, Sixth Floor

9:00 to 10:30 a.m.

PLENARY SESSION: "Drug Information: Government, Industry and Profession," Monroe Room, Sixth Floor.

Presiding Officer: Eric Martin, PhD., Director, Medical Communications, Lederle Laboratories, New York.

Moderator: Alfred Soffer, MD., Senior Editor, JAMA, Chicago.

Discussants:

Joseph C. Stetler, MD., President, Pharmaceutical Manufacturers Association, Washington, D.C.

"Is the Public Getting the Facts?" Theodore O. Cron, Assistant Commissioner for Education and Information, Food and Drug Administration, Washington, D.C.

"Freedom of Information and the FDA"

Thomas E. Gaffney, MD., Professor of Clinical Pharmacology, Cincinnati General Hospital.

"Drugs, Therapeutics and University Medical Centers: Emerging Issues"

Richard L. Landau, MD., Professor of Medicine, Director of the Clinical Research Center, University of Chicago.

"The Midwest Committee on Drug Investigation—an Instrument for Improving Relations between the Pharmaceutical Industry and Academic Medicine"

10:30 to 10:45 a.m. INTERMISSION Time to visit the exhibits.

10:45 to 12:00 noon
PLENARY SESSION: "Ethics and
Medical Communication," Monroe
Room, Sixth Floor.

Presiding Officer: C. Howard Ross, MD., Executive Committee, A.M.W. A., Ann Arbor, Michigan.

Moderator: E. Clinton Texter, Jr., MD., Editor-in-Chief, American Journal of Digestive Diseases, Associate Professor of Medicine, Northwestern University, Chicago.

Discussants:

René Menguy, MD., PhD., Professor and Chairman, Department of Surgery, University of Chicago. Bernard K. Forscher, PhD., Consultant, Section of Publications, Mayo Clinic; Assistant Professor, Biochemistry, Mayo Graduate School, Rochester, Minnesota. Frederick Silber, Managing Editor, Medical Tribune, New York.

12:00 to 12:30 p.m. Cash bar, Adams Room, Sixth Floor.

12:30 to 2:00 p.m.

LUNCHEON IN HONOR OF SPONSORS, Adams Room, Sixth Floor.

Edward J. Huth, MD., Philadelphia
President-Elect, A.M.W.A.

ADDRESS:

"The Research Report Requires Revision"
Franz J. Ingelfinger, MD., Editor
New England Journal of Medicine,
Boston.

2:00 to 3:30 p.m.
PLENARY SESSION, Monroe Room,
Sixth Floor.

AMWA Members' Contributions
Presiding Officer: W. D. Snively, Jr.,
MD., Vice President, Medical Affairs, Mead Johnson Co., Evansville,
Indiana.

2:00 p.m. "Dichotomy in Newspaper Medical Communications" Julian DeVries, Medical Editor, *The Arizona Republic*, Phoenix.

2:15 p.m. "Your Slides: A Visual Aid or Annoyance?" Keith W. Sehnert, MD., Assistant Medical Director, Dorsey Laboratories, Lincoln, Nebraska. 2:30 p.m. "Translation Services and the Non-Linguist" Dale S. Cunningham, "Into English,"

Camden, New Jersey. 2:45 p.m. "Some Funny Things Happened on the Way to Publication and Recognition" Abraham Tow, MD., F.A.A.P., Logan, West Virginia. 3:00 p.m. "The Package Insert: Signifi-

cance, Style, Synthesis" Paul V. Buday, PhD., Head, Drug Regulatory Affairs, Sandoz Pharmaceuticals, Hanover, New Jersey. 3:15 p.m. "Does Humor Have A Place in

Scientific Writing?" Richard L. Reece, MD., Associate Pathologist, St. Barnabas Hospital, Minneapolis.

3:30 to 3:45 p.m. INTERMISSION Time to visit the exhibits.

3:45 to 5:00 p.m.

PLENARY SESSION: "Television in Medical Communication," Monroe Room, Sixth Floor.

Presiding Officer: H. Kenneth Scatliff, MD., President, Chicago Chapter, A.M.W.A.

Moderator: Walter Carroll, MD., Professor of Surgery, Northwestern University; Associate Editor, Surgery, Gynecology and Obstetrics, Chicago.

Discussants:

Richard Burdick, Director of Network Affairs, Network for Continuing Medical Education, New York City.

Richard Judge, MD., Associate Professor of Medicine, University of

Michigan, Ann Arbor.

Dale Groom, MD., President, Association of Medical T.V. Broadcasters; Associate Professor of Medicine, Medical College of South Carolina, Charleston.

Joel Sternberg, PhD., Television Resident, Passavant Memorial Hospital, Chicago.

Saturday Evening

No official Association functions are planned for this evening. However, members are encouraged to take part in an informal walking tour of Old Town. Complete details will be available at the time of registration.

SUNDAY, SEPTEMBER 24

8:00 to 9:00 a.m.

1967/1968 Board of Directors: Dutch-Treat Breakfast Meeting, Room A, Sixth Floor.

9:00 to 9:30 a.m.

1967/1968 Executive Committee Meeting, Room A, Sixth Floor.

10:00 to 12:00 noon

WORKSHOPS

Coordinator: Shirley Motter Linde, MS, Freelance Science Writer, Chi-

1. "Scientific Journal Article," Room A, Sixth Floor.

Harold Laufman, MD., PhD., Director, Institute for Surgical studies, Montefiore Hospital, New York. Leland C. Hendershot, DDS., Editor, Journal of the American Dental Association, Chicago.

F. John Lewis, MD., Professor of Surgery, Northwestern University; Consulting Editor, Surgery, Gynecology, and Obstetrics, Chicago.

2. "News Writing for the Public and Medical Press," Room B, Sixth Floor Theodore Van Dellen, MD., Syndicated Medical Columnist, Chicago

Milton Liebman, Assistant to the Publisher, Hospital Practice, New York.

James Spaulding, Science Editor, Milwaukee Journal, President-Elect, National Association of Science Writers.

3. "Advertising Copy-Writing," Monroe Room, Sixth Floor.

David Hagues, President, Shaw-Hagues Advertising Agency, Chicago.

James F. Fleming, MD., President, Harry C. Phibbs Advertising Company, Chicago.

Norton Bramesco, Manager, Copy Department, L. W. Frohlich and Company, New York.

Clinical Symposium on Alcoholism

The North American Association of Alcoholism (NAAAP) will conduct a clinical symposium on "Alcoholism: the Joint Province of the Physician, the Community, and the Public Agency" on Sunday, Sept. 24, at the Sheraton-Chicago Hotcl.

The program is aimed at physicians, particularly general practitioners and internists. Current views on alcoholism will be presented along with descriptions of facilities available for the treatment and rehabilitation of alcoholics.

In addition, the program will provide a forum at which physicians can meet other professionals who are interested particularly in dealing with alcoholics.

In the morning session a selection of topics will be introduced by physicians with special knowledge about alcoholism and discussion will be invited from the floor.

Lead-off man for the afternoon will be Jack H. Mendelson, M.D., chief of the National Center for the Prevention and Control of Alcoholism (NIHM), speaking on "Research Aspects of Alcoholism." He will be followed by a panel of representatives from other but related fields, such as social work, psychology, and sociology.

The NAAAP is a national organization whose membership consists of state programs of alcoholism and other agency members, as well as of individuals who are interested or participating directly in some

effort to benefit the alcoholic patient. Its goals include furthering understanding, prevention, treatment, rehabilitation, rescarch, and education in regard to every phase of alcoholism. The multidisciplinary nature of NAAAP invites representatives from many areas of learning and experience to contribute to understanding the complexities of alcoholism.

The symposium, held for the fourth consecutive year, will take place on the first day of a five day annual meeting of NAAAP. The aim of the symposium is to emphasize that a continuum of different levels of care is necessary for effective treatment and rehabilitation of the alcoholic. Depending upon his condition, the alcoholic can be ushered into the appropriate level of treatment, offered by a variety of facilities. Learning to use the continuum of carc will enable the physician to share the care of the alcoholic and unburden himself.

The other four days of this annual meeting will be devoted to presentations of a variety of papers on alcoholism, arranged according to seven special interest sections. Physicians are welcome to attend the symposium as a single day or the entire meeting.

Further information may be obtained from The Division of Alcoholism, Illinois Department of Mental Health, 401 S. Spring St., Springfield 62706.

Alcoholics Anonymous To Hold International Convention In Florida

The next international convention of Alcoholics Anonymous will be held July 3-5, 1970, at Miami Beach's Fontainebleau and Eden Roc hotels and Convention Hall, according to an announcement by the movement's General Service Board, which maintains a world service and information center in New York.

The fellowship of recovered (non-drinking) alcoholics will be celebrating the 35th anniversary of its founding in Akron, Ohio, by two ex-drunkards formerly considered hopeless. Such an international convention is held by A.A. every five years. This will be the first in the Southern U.S.A.

Using past conventions as a guide, Dr. John L. Norris, Rochester, N.Y., Associate Medical Director of the Eastman Kodak Co. as well as nonalcoholic chairman of the A.A. Board, said probably more than 12,000 non-drinking alcoholics and their families and friends from at least 35 countries will sample Southern hospitality in Florida without the use of mint juleps, gin fizzes, or any other alcoholic beverage.

Also present will be scores of guest experts on alcoholism representing medicine, industry, psychology, the law, churches, schools, the judiciary and other governmental branches, he said. The movement's

surviving co-founder, a former stockbroker known only as Bill W., and his wife, Lois, will be there too. The Al-Anon Family Groups and Alateen—similar but unrelated fellowships for nonalcoholic spouses and other relatives of alcoholics—will convene at the Eden Roc the same weekend.

Alcoholics Anonymous now has an estimated membership of over 350,000, and this year seems to be "fermenting" for the first time behind the Iron Curtain, Dr. Norris announced. However, since the native word meaning anonymous also implies secret or conspiratorial, the members call themselves a name which means "Alcoholics Unknown."

Dr. Norris said that a total of 13,279 autonomous A.A. groups with memberships ranging from 2 to 325 now flourish in 90 countries and hold a total of more than 16,000 A.A. meetings each week.

Dr. Norris noted that recent months saw increased understanding by the public of certain distinctive A.A. principles: personal anonymity for members in print and on the air, non-acceptance of money from any source except A.A. members, non-affiliation with all professional and any other agencies working in the field of alcoholism, neither endorsing nor opposing drinking itself, supporting no opinions on moral or legal questions about alcohol, and free membership open to any problem drinker.

Services which A.A. does *not* perform for problem drinkers include scientific research on alcoholism, medical or hospital treatment, psychiatric diagnosis or counselling, and such social services as providing housing, food, clothing, jobs, money, or legal advice, Dr. Norris said, pointing out that the service which A.A. provided is described simply as "helping others to recover from alcoholism by sharing our experience, strength, and hope with each other."

In this connection, the A.A. Board, which publishes books and pamphlets in 10 languages for the movement, distributed 2,135,923 printed recorded messages for alcoholics in the last year—99,270 given free to alcoholics from all parts of the world who wrote for help from A.A.'s General Service Office here, Dr. Norris said.

LOOKING FOR A TAX-FREE PLACE TO INVEST YOUR MONEY?

GET THE FACTS ON



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An open staff institution, it provides, through its house and attending staff, a total range of psychotherapies and those related activities which round out a comprehensive treatment program.

A new Half Way Hall, situated in the hospital, has been opened to provide relative freedom of movement in an environment designed to stimulate recovery and provide a necessary phase of interim residence.

A completely open section is a feature of North Shore Hospital's residential plan.

An adolescent program offers boys and girls of high school age a closelystructured program of daily care, with daily classroom attendance and individual tutoring emphasized.

The adjunctive therapies are manned by certified personnel. Occupational and recreational activities not only help structure the patient's day, but offer creative programs in which patients participate according to their emotional health and native capacity.

A therapeutic education program has been introduced for all patients. Medicare patients are offered special attention and remotivation activities.

Psychiatric testing and evaluation is offered, as is individual and group therapy, chemotherapy and the traditional modalities employed in the treatment of emotional illness.

In reputation, performance and location, North Shore Hospital is the psychiatric hospital of choice.

NSTI -

For information, contact: Y
CHARLES H. JONES, M.D.
Superintendent & Psychiatrist in Chief
Telephone: 312—446-8440
225 Sheridan Road, Winnetka, Illinois
(Write for Brochure)

Aspirin

(Continued from page 181)

fects of aspirin are not limited to its capacity to relieve pain but that it also has a significant anti-inflammatory and fever-reducing action. This finding has considerable clinical importance for the physician now has reason to avoid agents which entail higher risks," he adds.

Dr. Decker also refers to other agents in the medical armamentarium for the treatment of rheumatoid arthritis.

"When conservative drugs prove ineffective however," he writes in the *Today's Health* article, "doctors have a wide variety of anti-inflammatory and immunosuppressive agents, such as gold compounds, phenylbutazone, adrenocortical steroids, and many others. Although these often provide immediate and dramatic improvement, they carry the hazard of undesirable side effects, and are used mostly in special situations and for limited periods, under close supervision."

Of all the major forms of arthritis, Dr. Decker reports, rheumatoid arthritis, which afflicts about five million Americans, is the most painful, the most crippling, and the most baffling in terms of its cause.

"Recent research findings lead many investigators to believe that this public enemy's days are numbered," states Dr. Decker. "Gout, another inflammatory joint disorder which has bedeviled man throughout history, can now be controlled. It is presently the view of The Arthritis Foundation that 'the question is no longer whether arthritis will be controlled, but when," says Dr. Decker.

Arthritis costs the nation about \$2 billion per year, the report states. More than \$435 million is spent yearly by arthritics on non-prescription drugs.

"Right now those with rheumatoid arthritis can find relief," says Dr. Decker. "If they shun quacks and self-treatments, consult their doctors at the first signs of the ailment, and cooperate in treatment, the chances of avoiding severe disablement are heavily in their favor."



For the emotionally-disturbed young adult, an inpatient program with provisions for after-care



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DES PLAINES, ILL.



Clinics for Crippled Children

Twenty-seven clinics for Illinois' physically handicapped children have been scheduled for September by the University of Illinois, Division of Services for Crippled Children. The Division will conduct 20 general clinics providing diagnostic orthopedic, pediatric, speech and hearing examination along with medical, social, and nursing service. There will be four special clinics for children with cardiac conditions and rheumatic fever, and three for children with cerebral palsy. Clinicians are selected from among private physicians who are certified Board members. Any private physician may refer to or bring to a convenient clinic any child or children for whom he may want examination or consultative services.

Sept. 6, Rock Island Cerebral Palsy-Foss Home, 3808 Eighth Ave.

Sept. 6, Carmi-Carmi Township Hospital

Sept. 6, Hinsdale—Hinsdale Sanitarium Sept. 6, Jacksonville-Holy Cross Hospital

Sept. 7, Effingham General—St. Anthony Memorial Hospital

Sept. 7, Peoria Cerebral Palsy (A.M.)— Roosevelt School

COOK COUNTY

Graduate School of Medicine CONTINUING EDUCATION COURSES

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PATHOLOGY REVIEW COURSES FOR SPECIALTIES, Request

DATES
PROCTOSCOPY & VARICOSE VEINS, One Week, September 11.
PRINCIPLES OF OPERATIVE SURGERY, Two Weeks, October

SURGERY OF THE HAND, One Week, September 18 SURGERY OF THE STOMACH, One Week, September 18 SURGERY OF FACE, MOUTH & NECK, One Week, Septem-

SURGERY OF FACE, MOUTH & NEUR, One Week, September 18
BLOOD VESSEL SURGERY, One Week, October 9
VAGINAL APPROACH TO PELVIC SURGERY, One Week, September 18
ADVANCES IN GYNECOLOGY & OBSTETRICS, One Week, September 25
SPECIALTY REVIEW COURSE IN OB-GYN, Two Weeks, October 16
BASIC ELECTROCARDIOGRAPHY, One Week, October 9
ADVANCES IN PEDIATRICS, One Week, September 25
PEDIATRIC SURGERY, One Week, September 25
PEDIATRIC SURGERY, One Week, September 18
ANESTHESIA, Inhalation, Endotracheal, Regional, Request Dates

Information concerning numerous other continuation courses available upon request.

TEACHING FACULTY Attending Staff of Cook County Hospital

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REGISTRAR, 707 South Wood Street, Chicago, Illinois 60612

Sept. 7, Anna-Union County Hospital Sept. 7, Sterling-Community General Hospital

Sept. 8, Chicago Heights Cardiac-St. James Hospital

Sept. 12, East St. Louis-Christian Welfare Hospital

Sept. 12, Peoria General-Children's Hospital

Sept. 13, Champaign-Urbana—McKinley Hospital

Sept. 13, Joliet-St. Joseph's Hospital

Sept. 14, Macomb-McDonough District Hospital

Sept. 14, Springfield General-St. John's Hospital

Sept. 14, Decatur-Decatur & Macon County Hospital

Sept. 14, Elmhurst Cardiac-Memorial Hospital of DuPage County

Sept. 26, Belleview-St. Elizabeth's Hospital Sept. 26, Peoria General-Children's Hospital

Sept. 27, Centralia-St. Mary's Hospital Sept. 27, Springfield Cerebal Palsy (P.M.)—

Diocesan Center, St. Paul's Cathedral, 815 So. 2nd

Sept. 27, Elgin-Sherman Hospital

Sept. 27, Evergreen Park-Little Company of Mary Hospital

Sept. 28, Effingham Rheumatic Fever & Cardiac-St. Anthony Memorial Hospital Sept. 28, Sparta—Sparta Community Hospital

Sept. 28, Rockford-Rockford Memorial Hospital

Sept. 29, Chicago Heights Cardiac-St. James Hospital

The Division of Services for Crippled Children is the official state agency established to provide medical, surgical, corrective, and other service and facilities for diagnosis, hospitalization and after-care for children with crippling conditions or who are suffering from conditions that may lead to crippling.

In carrying on its program, the division works cooperatively with local medical societies, hospitals, the Illinois Children's Hospital-School, civic and fraternal clubs, visiting nurse associations, local social and welfare agencies, local chapters of the National Foundation and other interested groups.

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p prevent infection is hourns, and abrasions; " aid in healing.

OBITUARIES

- *Dr. Victor E. Engelmann died June 22 at the age of 72. He practiced in Roseland for 47 years and was on the staff of the Roseland Community Hospital.
- *Dr. Orval J. Gause died June 26 at the age of 79. He was a practicing physician in the Palmyra and Greenfield area for 50 years and was a past president of Macoupin County Medical Society and a member of the ISMS Fifty-Year Club.
- *Dr. Kenneth P. Johnston died June 21 at the age of 62. He was an orthopedic specialist in Elgin for 31 years.
- Dr. Robert Kimbrough, Jr., died June 1 at the age of 68. He was a former president and medical director of the American College of Obstetricians and Gynecologists.
- *Dr. Frank N. Mason died June 29 at the age of 63 in Ravenswood Hospital, of which

- he was a staff member. He practiced in the Rogers Park area for 37 years.
- *Dr. Frederick M. Nicholson died July 10 at the age of 78. He was on the staff of Norwegian-American Hospital, Chicago.
- *Dr. F. L. Puckett, Marion, died June 20 at the age of 62. He practiced at Stonington prior to Marion nine years ago where he was on the medical staff of the Veterans Administration Hospital.
- *Dr. Chester A. Samlow died July 3 at the age of 62. He was a proctologist on the staff of Northwest and St. Mary of Nazareth Hospitals, Chicago.
- *Dr. Clinton D. Swickard died June 9 at the age of 75. He had practiced in Charleston for 48 years, and was past president of Coles-Cumberland County Medical Society.

Medicine and Religion (Continued from page 183)

sonnel and the care and treatment administered. He helps the patient feel more trustful and secure. Of course, if the patient if irreligious, or is angry with God, then he may react negatively to the chaplain.

- 2. The chaplain brings understanding of the patient's feelings. The patient may be confused by the strangeness of the hospital experiences and not know how to react to them. The chaplain encourages acceptance of treatment and cooperation with friendly therapy team.
- 3. The chaplain *interprets* experiences to the patient. The patient may be confused by pain, suffering, the necessity for medication or surgery, the acceptance of long hospitalization, the adjustment to handicaps and disappointments. The chaplain helps relate these experiences to his religious faith.
- 4. The chaplain discovers the spiritual resources of the patient. He finds out about his religious background and helps the patient utilize resources which he gained earlier in life and may have neglected or misunderstood. He administers to the patient those Sacraments or spiritual aids which he is able to use.

5. The chaplain helps the patient develop new spiritual resources. "New occasions teach new duties." Periods of stress and strain often sharpen the growing edge and the chaplain can encourage and guide spiritual growth. He may help the patient mature through adversities or grow in ways of service rather than regress or be hurt or become embittered.

How can the doctor and the nurse help the chaplain minister to the patient? In the following ways:

- 1. Notify the chaplain of patients who need the chaplain or clergyman.
- 2. Report to the chaplain pertinent information concerning physical and emotional condition, mental alertness, spiritual needs.
- 3. Protect the privacy of the chaplain and patient when the chaplain is calling, keeping visitors, treatments and interruptions to a minimum while he is there.
- 4. Assist the patient in his private devotions or Sacraments by providing necessary encouragement, understanding, equipment, example and respect.



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Illinois Medical Journal

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september, 1967

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Abstracts of Board Actions

July 29-30, 1967

BROADENED SERVICE OCCUPATION TAX

The Board of Trustees has authorized ISMS Legal Counsel Frank Pfeifer to file an injunction if physician-dispensed medicines are included in the newly broadened Service Occupation Tax in Illinois. Although the law pertains specifically to "regular pharmacists or druggists" dispensing a physician's prescription, it has been extended by ruling to cover dispensing of medicines by physicians as well as the services rendered.

COMMITTEE REORGANIZATION COMPLETED

Re-structuring of the Illinois State Medical Society committees under a council system, as ordered by the 1967 House of Delegates, has been accomplished and personnel appointed. A few conflicts have been discovered in the amended Bylaws and these have been referred to the Committee on Constitution and Bylaws. A complete list of council and committee personnel will appear in the annual reference issue of the Illinois Medical Journal next month.

RENEW STUDY OF RELATIONS WITH OSTEOPATHS

On recommendation of the Policy Committee, the Board of Trustees has re-activated study of the relationship between medicine and osteopathy. Dr. William E. Adams, Chicago, has been named chairman of a new trustee committee to consider such problems as Medicare's effect on osteopathic use of community hospital facilities, the increasing number of requests for physicians to participate in scientific and educational programs with osteopaths, and the important changes occurring within the framework of osteopathy at the national level.

CMS REFUSES TO MERGE SCIENTIFIC SESSIONS

In the wake of two recent adverse actions by the Chicago Medical Society concerning the proposed merger of the CMS Clinical Conference and the ISMS Annual Scientific Assembly, the Board of Trustees has voted to discontinue pursuing the idea. CMS states that "it was the unanimous opinion of the committee (to study the proposal) that no further effort be made to effect a merger at this time."

USE OF EXTERNS IN HOSPITALS

In following up action on Resolution 29 passed by the 1967 House of Delegates, the Board of Trustees is requesting that an ISMS delegation be allowed to appear before the Joint Commission on the Accreditation of Hospitals when the subject of hospital externs is discussed. It is the position of ISMS that externs should be allowed in certain hospitals and the commission is reported to be reviewing its policy disapproving their use.

for September, 1967 233

OFFICERS TO STUMP STATE

The Division of Public Relations and Economics has been given approval to set up a 16-city speaking tour for the society's president and president-elect. Press interviews and appearances before county medical societies and civic organizations will be arranged for Dr. DuPuy and Dr. Thomsen, who will be encouraged to speak out on timely subjects of socio-economic interest. The Board has authorized the officers to state personal viewpoints on matters where the society has no established policy.

CLOSED CIRCUIT TELEVISION

The Board has authorized the Public Relations Committee to rent a television camera and video-taping equipment for a period of one or two months for experimenting with closed circuit TV. The Committee recommends that the PR staff learn to operate this equipment, with a view toward its eventual purchase so that ISMS can tape medical programs and make them available to county societies across the state.

LONG-TERM CARE FACILITIES

The Committee on Aging has been given authority to cooperate with the Hospital Planning Council of Metropolitan Chicago in developing an educational program for administrators of long-term care facilities similar to those in hospital administration, and to conduct, in cooperation with the Illinois Public Health Department, a census of such existing facilities in the state. In its recommendation to the Board, the Committee stated "this is an opportunity for medicine to influence the standards and quality of care in the long-term facilities."

FEE DISPUTES WITH PUBLIC AID DEPARTMENT

In order to expedite adjudication of fee disputes with the Illinois Department of Public Aid, county medical societies are again urged to appoint one single committee to negotiate with IDPA. Dr. Henry Holle, IDPA medical director, has requested trustees to report specific complaints of physicians who believe they have been treated unfairly in the matter of fee reimbursement.

DR. PRESS LAUDED

The Board is on record as expressing its appreciation for the services of Dr. Edward Press, who has resigned his position as Assistant to the Director of the Illinois Department of Public Health. Dr. Press informed the Board he had accepted a post as Oregon State Health Officer.

helps solve "the other problem" in venereal disease

The "other problem" in venereal disease is the sensitivity of many patients to penicillin and the increased resistance of the gonococcus.

Regarding Increased Resistance—During the last eight years, 5700 strains of *N. gonorrhoeae* have been isolated and tested for sensitivity to penicillin and sulfadiazine in the Public Health Laboratory (Toronto). (1) In the six-month period of January to June, 1966, no less than 18.8 per cent of the *N. gonorrhoeae* strains isolated required 1.0 unit of penicillin per ml to inhibit their growth; and 8.6 per cent required more than 1.0 unit. In contrast, only eight years ago, 98 per cent of the isolates were sensitive to 0.1 unit of penicillin or less.

Regarding Sensitivity—It has been reported that approximately 15 per cent of all patients admitted to a large hospital have a history of being allergic or hypersensitive to penicillin. It likewise has been stated that conventional skin testing with penicillin is not reliable and that more elaborate testing for sensitivity is not readily available. (2)

Regarding DECLOMYCIN—Excellent results have been achieved with DECLOMYCIN as a therapeutic alternative in a series of studies (3-8) representing a cross-section of national experience (Los Angeles, California; Columbia, So. Carolina; Houston, Texas; New York, New York; Boston, Massachusetts and Washington, D.C.). 1931 patients received DECLOMYCIN for treatment of acute gonorrheal urethritis. The overall cure rate achieved was 89 per cent!*

In syphilis, dosage schedules of a total of 12 to 18 Gm given in equally divided doses over a period of 10 to 15 days should be followed.

*The above studies utilized DECLOMYCIN in a variety of dosage schedules. The recommended adult dosage of DECLOMYCIN is 600 mg divided into two or four doses daily.

1. Amies, C. R.: Development of Resistance of Gonococci to Penicillin: An Eight-Year Study.

Canad. Med. Ass. J. 96(1):33 (Jan.7) 1967. 2. Garagusi, V. F.: Antibiotic Review. Amer. Fam. Phys. 11:61 (Nov.) 1966. 3. Sokoloff, B.: Demethylchlortetracycline Therapy in Acute Gonococcal Urethritis.

Clin. Pharm. Ther. 6:350 (May-June) 1965. 4. Allison, J. R., Jr.: Demethylchlortetracycline

Hydrochloride in the Treatment of 267 Patients with Acute Gonorrhea: Results and Evaluation. Antibiot.

Chemother. 11:454 (July) 1961. 5. Vanderstoep, E. M.; Matheson, T. E.; Moore, M. B.; Short, D. H.,

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Gonorrheal Urethritis in the Male. Southern Med. J. 57:201 (Feb.) 1964. 6. Marmell, M. and Prigot, A.:

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Dose Treatment of Acute Gonococcal Urethritis with Demethylchlortetracycline. Antibiot. Med.

8:75 (Feb.) 1961. 8. Greaves, A. B.: Demethylchlortetracycline in the Treatment of Venereal Disease.

Unpublished data on file, Medical Research Section, Lederle Laboratories.



for September, 1967 241

helps solve "the other problem" in veneral disease

Effective in a wide range of everyday infections—respiratory, urinary tract and others—in the young and aged—the acutely or chronically ill—when the offending organisms are tetracyclinesensitive.

Contraindication: History of hypersensitivity to demethylchlor-tetracycline.

Warning—In renal impairment, usual doses may lead to excessive accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated, and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort. Necessary subsequent courses of treatment with tetracyclines should be carefully observed.

Precautions—Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment.

Side Effects—Gastrointestinal system—anorexia, nausea, vomiting, diarrhea, stomatitis, glossitis, enterocolitis, pruritus ani. Skin—maculopapular and erythematous rashes. A rare case of exfoliative dermatitis has been reported. Photosensitivity: onycholysis and discoloration of the nails (rare). Kidney—rise in BUN, apparently dose related. Hypersensitivity reactions—urticaria, angioneurotic edema, anaphylaxis. Teeth—dental staining (yellowbrown) in children of mothers given this drug during the latter half of pregnancy, and in children given the drug during the neonatal period, infancy and early childhood (up to 12 years). Enamel hypoplasia has been seen in a few children. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; Tablets: film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

DECLONYCING DEMETHYLCHLORTETRACYCLINE



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Sea Shells Replace Shock Treatment for Veterans

Shock boxes are being replaced by boxes of sea shells in the treatment of mentally ill veterans. In the process, more effective and humane care is provided and millions of dollars are saved each year.

VA doctors are applying some old principles with new insight, and the payoff is help for mentally ill patients in half the time needed a few years ago.

A new approach to treatment puts the entire hospital staff on the treatment team. For each patient, the doctor prescribes one of five basic attitudes that should be adopted toward a patient by everyone concerned -doctors, nurses, attendants, and even maintenance men. A depressed patient, for example, might be treated with "kind firmness." Instead of using an electric shock to literally jolt a patient back to reality from a severely depressed state, doctors now insist, with kind firmness, that the patient work endlessly at a monotonous unrewarding task like sorting a box of seashells. When the patient becomes so emotional about the monotony that he rebels, he is on the road to recovery, VA psychiatrists have learned. It works only if the attitude is applied consistently by all concerned. Still other patients might be treated with "active friendliness," "passive friend-liness," "matter of factness," or "no de-

Treatment programs of this type, coupled with the use of anti-psychotic and anti-depressant drugs, have wiped out the long waiting lists of veterans seeking treatment in VA psychiatric hospitals. At the Perry Point, Md., hospital, the waiting list often reached 350. Today there is no waiting list and the hospital has admitted 140 veterans formerly hospitalized in state and other institutions. A similar record has been set at the VA hospital at Tuscaloosa, Ala., where Mr. James C. Folsom developed the attitude therapy program.

The approach succeeds because everyone can understand attitudes—while psychiatric terminology may sound like mumbo jumbo to them and conventional treatment techniques seem vague and mysterious.

The president's page



Newton DuPuy, M.D.

For the past several years August has been the month when the Illinois State Medical Society has published the annual reference issue of its *Illinois Medical Journal*. A major feature of the reference issue has always been a roster of ISMS committees, and because the 1967 House of Delegates ordered a major reorganization of the society's committee system, it was decided to postpone publication of the annual reference issue until the new committees were appointed. These appointments have now been made and the reference issue will be published in October.

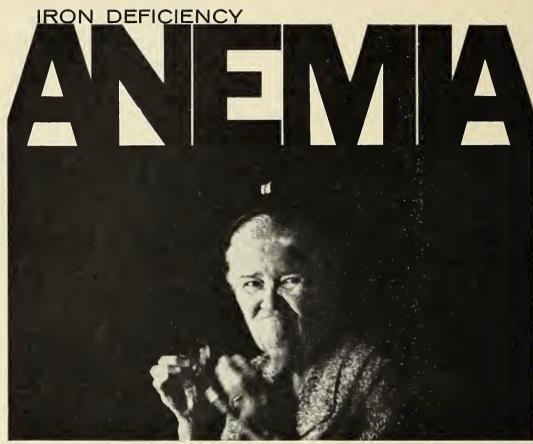
The reorganization of the society's committee structure was no small job. Two of our committees worked long and diligently to bring it about. Much of the credit for what has been accomplished belongs to these committees and their chairmen—Dr. William Schowengerdt, of Champaign, chairman of the Committee to Study Committees, and Dr. Andrew Brislen, Chicago, chairman of the Committee on Constitution and Bylaws.

This reorganization was inspired by two major problems— (1) Too few Illinois doctors actively participating in the affairs of organized medicine (although ISMS has had a large number of committees, the total number of members participating has been relatively small, with a few physicians serving on several committees) and (2) Too many committees reporting directly to the Board of Trustees, resulting in the Board having insufficient time to study the issues

presented and make sound policy decisions even though its meetings have been running longer and longer. The Board of Trustees normally meets five times a year (exclusive of meetings held during the annual convention). It usually convenes at 7 p.m. on Saturday and often doesn't break up until the early hours of Sunday morning; then it begins again at 9 a.m. Sunday and continues well into the afternoon.

In its attempt to establish a functional, efficient system, broadly based to include as many members as possible, the Committee to Study Committees soon realized that in order to do any sensible revamping, it would be necessary to change the Constitution and Bylaws, which specified certain things about a few committees— including their election by the House of Delegates. These specifications made for an inflexible system creating inefficiency without causing the House-elected committees to be any closer to the grass roots membership than any other committees. Therefore, it was recommended, and subsequently approved by the House, that all committees would be appointed by the Board of Trustees. When this change in the Constitution and Bylaws was accomplished, it was possible to reorganize the committees by discontinuing some that had served their purpose, merging others where there was overlapping of duties, and most importantly, re-group the committees into a system of councils for ef-

(Continued on page 334)



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with hypochromic alemia, patients who cannot be relied upon to take oral iron.

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CONTRAINDICATIONS: Imferon (iron dextran injection) is contraindicated in patients sensitive to iron dextran complex. Since its use is intended for the treatment of iron deficiency anemia only it is contraindicated in other anemias

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Survey of Cryo-Ophthalmology

By John G. Bellows, M.D., Ph.D.,/Chicago

Cryosurgical technics for retinal detachment, cataract extraction and for destruction of accessible tumors of the eye and adnexa are gaining adherents among ophthalmologists daily. With each description of a new application of low temperature treatment for an eye disease, the number of ophthalmologists interested in ocular cryosurgery grows. The latest addition to the diseases of the eye that can be treated successfully by the application of a cold probe is herpesvirus keratitis. This was first described by Krwawicz in Poland where acceptance of cryosurgery for the purposes mentioned is unanimous.^{1,2} The other iron curtain countries and the Scandinavian countries have also universally adopted cryosurgical technics. In Western Germany, its use is widespread, as it is in the South American countries. In France, its adoption is growing.

It is curious that acceptance has been reluctant in the United States, although interest is increasing. This reluctance may stem from political skepticism's extension into medical accomplishment. The waitand-see attitude in the United States will persist in a measure, for a while also, because of medico-legal liability should a case be unsuccessful. As more and more reputable ophthalmologists continue to experience success and report their results,

the barriers to total acceptance will be removed. They are being removed now to the extent that an organization has been formed, The Society for Cryo-Ophthalmology, composed of over 300 members in the United States alone.

Cryosurgical Principles

Freezing produces three types of tissue reactions. The mildest is an adhesive effect as in the operative procedure for cataract extraction. The second is an inflammatory reaction as in the operative procedure for retinal detachment. The severest is the necrotizing effect for the destruction of tumors. In all these reactions the desired results depend on a time-temperature relationship. The common temperatures are −25 to 30°C. obtained from Freon, −79°C. obtained from solid carbon dioxide, and -196°C, obtained from liquid nitrogen.³ Because of the precise relationship of freezing response to time and temperature the cryosurgeon can reproduce the effects, predict his results and sharply limit the area to be treated.

Adhesive Properties of Ice

It is a common experience that when a moistened finger touches a cold metal surface, it will adhere. This property of cold to produce adherence between the tip of a cold instrument and a warm moist tissue has so far been used only by cryo-ophthalmologists to extract cataracts. Cryo-extraction depends on a freezing fusion of the tip of the instrument and the cataract. Effec-

Dr. Bellows, who is associate professor of ophthalmology at Northwestern University, presented this paper May 24 during the 127th annual meeting of the Illinois State Medical Society.

tive adherence is achieved with temperatures ranging between -15° C. and -60° C. If the tip of the instrument is too cold, i.e. below -100° C., adherence between the cold tip and the cataract is diminished, because the ice crystals are too small. The mechanical superiority of this method of grasping the cataract permits the surgeon to extract cataracts with minimal accidental capsular ruptures.

Inflammatory Response to Freezing

The common experience of surgeons with an inflammatory response to uncontrolled freezing is frostbite. Most patients are observed in military service; the civilian surgeon sees only an occasional patient with frostbite. The amount of injury from freezing is variable. For example, in severe freezing of a limb, capillary obstruction and stasis lead to irreversible changes and death of the limb.

In contrast the inflammatory response produced by controlled low temperatures is used advantageously by ocular surgeons in the treatment of retinal detachment. In this operation the surgeon substitutes a cold probe at about - 60°C. for the application of previous diathermy. The tip of the cryoprobe is kept in brief contact with the sclera over the area of the retinal hole. When the surgeon sees the retina just turning white with the indirect ophthalmoscope, he removes the probe. This method of using localized and controlled freezing produces an effective adhesive chorioretinitis which seals the retinal hole without damaging the sclera or vitreous.

Destructive Properties of Ice Formation in the Tissues

The property of freezing to produce necrosis and irreverisble changes in tissues and organs is used by the cryosurgeon to destroy benign and malignant tumors. It is also of value in the treatment of diabetic retinopathy. Transphenoidal cryohypophysectomy producing partial or complete destruction of the pituitary gland in selected cases of diabetic retinopathy has improved the visual acuity of some patients greatly or halted the progression of the disease. Patients that are selected for this treatment must be able to cooperate during the postoperative course, and they must have salvagable vision.

Cryoextraction of Cataracts

Although many ophthalmic surgeons obtain above-average results with forceps or the erisophake and although a gifted few achieve almost perfect results, the average and the young ophthalmologist would benefit from the use of the cryoextractor. With this instrument, his results approach those achieved by the most skilled of surgeons by the older instruments. The surgeon who adopts the cryoextraction method for the removal of cataracts finds that this operative procedure is far simpler, safer, and more satisfactory than the older methods.

The most important single mechanical factor in which the methods of forceps extraction, erisophake extraction and cryoextraction differ is in the method of grasping the cataract. In the older methods with the forceps and the erisophake, the tenuous grasp is on the fragile capsule of the lens. It is the capsule alone that must withstand the entire tractive force of withdrawal; whereas in cryoextraction, the intralenticular ice mass that forms within the lens causes the even distribution of the tractive force thoughout the lens; and direct traction upon the capsule is eliminated. It is difficult to conceive of a sounder mechanical principle for the removal of a cataract than by the formation of an intralenticular ice wedge with a high breaking point.4 No claim is made that cryoextraction totally eliminates accidental capsular ruptures. Occasionally the cryosurgeon does break a lens capsule, either because of improperly prepared instruments or because of unusual resistance encountered in the zonular or capsulohyaloid attachments. But on the whole, the same surgeon will break fewer capsules with the cryoextractor than by the older methods.

Cryoretinopexy

Low temperature applications in the treatment of retinal detachment are now widely used by retinal surgeons. They use diathermy sparingly because cryoretinopexy is safer and yields superior results. Low-temperature technic is superior to diathermy because of scleral resistance to freezing, of lessened uveitic reaction, lessened danger of vitreous shrinkage, and the superiority of the cryolesion over the lesion produced by diathermy.⁵

Cryotherapy For Iris Prolapse And Ocular Tumors

An iris prolapse responds by atrophy when a cold probe at -79° C. (solid carbon dioxide temperature) is applied to it for 10 to 15 seconds. The probe must be thawed before it is removed from the treated area; otherwise the conjunctiva covering the prolapsed iris will tear. A flat pigmented area remains.

Benign and malignant tumors of the globe and lids, which are readily accessible to the cold probe, may be destroyed by the application of a cold probe at a temperature below -100° C. The time interval of the contact between the probe and the mass varies with the size and location of the tumor. Freezing should be of sufficient type and degree to produce intracellular ice which is usually lethal to most types of cells.

Cryotherapy of Herpesvirus Keratitis

The adoption of IDU (5-iodo-2'-deoxyuridine) and other antiviral agents in recent years has greatly improved the prognosis and the results of treatment of fresh superficial herpesvirus keratitis. This disease has become common and is an important disease of the cornea. Unfortunately the antiviral agents are effective in only 60 percent of herpesvirus infections of the cornea. In the chronic form of herpesvirus keratitis with stromal involvement, these agents are even less effective. If the patient does not respond to the antiviral agents, or if a hypersensitization to them should develop, the ophthalmologist must then resort to the older methods of treatment, including chemical cauterization.

Recently in the resistant form of this infection or when hypersensitization to the antiviral agents develop or when patients do not respond to chemical cauterization, the application of a low temperature probe to the diseased cornea has produced striking results.

A possible explanation for the effectiveness of cryotherapy in herpesvirul keratitis is in the reports of Donald Greiff who demonstrated experimentally that freezing and thawing in rapid succession of influenza virus in a suitable medium caused disruption of the virus and greatly reduced their number.⁶ Greiff observed that the optimal freezing temperature for reducing

the virus concentration was -40° C. By mere chance this is the approximate temperature that ophthalmologists have been using in the clinical treatment of herpesvirus keratitis. It is estimated that the temperature at the junction of the cornea and the probe refrigerated with carbon dioxide snow is between -40° to -50° C.

Method of Treatment

Cryotherapy for superficial herpes simplex keratitis is a simple office procedure in which the cornea is first stained with sodium fluorescein to reveal the extent of involvement. The Bellows CO₂ cryoextractor is prepared, so that the temperature of the tip is about -79° C. The cornea is anesthetized with a 2 per cent solution of tetracaine hydrochloride. The lid is lifted with an elevator, and the patient is directed to fix his gaze on a distant object.

The cold tip of the cryoextractor is applied to each part of the stained corneal lesion three times in rapid succession for seven seconds each time. After each application the cold tip is thawed by a stream of saline solution to separate the instrument from the cornea. No topical applications or patching is required after the treatment.

The procedure itself is painless, but the patient is warned that there will be a slight-to-moderate degree of discomfort for 12 to 14 hours. The distress is readily controlled with a simple oral analgesic.

Examination of the cornea on the next day will reveal an area of staining that corresponds to the points of application; it no longer shows a characteristic dentritic outline. In fresh cases of superficial herpesvirus keratitis thus treated, the cornea is clear, does not stain and has regained its normal luster in about 4 days.⁷

Theoretical Considerations

A working hypothesis can now be offered for the effectiveness of cryotherapy in herpesvirus keratitis. The repeated application of the cold probe to the infected corneal epithelium disrupts the virus contained in the cells and thereby reduces their number. At the same time the frozen epithelial cells are disrupted and then release a high concentration of interferon which had formed endogenously in the infected cells. (Interferon is an effective antiviral agent, interfering with the repli-

cation of the virus.) The reduced concentration of virus and the high concentration of the interferon enter the uninvolved epithelial cells. There the high concentration of interferon easily prevents the multiplication of the virus. The infectious process in the cornea comes to a halt. With the subsidence of the infection, the healthy surrounding epithelial cells migrate and spread into the area denuded of epithelium. As already stated the entire process of recovery from a fresh case of superficial herpesvirus keratitis after cryotherapy takes place in three or four days. It does not leave any scars on the cornea.8

In contrast with the rapid recovery after cryotherapy in fresh cases of superficial forms of herpesvirus keratitis, chronic cases with deep corneal involvement usually requires three or more cold applications at six-day intervals. The following case typifies the management of a chronic

form of herpesvirus keratitis:

On Jan. 30, 1967, a 4-year-old boy who had been treated for two months for herpesvirus keratitis with antiviral agents as well as other forms of traditional therapy was referred to me for cryotherapy. Photophobia of the left eye was extreme. The visual acuity was 20/200. The stained cornea had a dendritic lesion and the lower half of the cornea was deeply affected. Corneal sensitivity was diminished. Under a general anesthetic, the cryoapplicator, cooled with carbon dioxide snow, was applied to the entire corneal lesion. However, because the diameter of the applicator was only 2mm., the applicator had to be applied to eight different areas in order to cover the entire lesion. Each of these eight areas was frozen for 7-second intervals and then thawed rapidly. This was repeated three times in rapid succession. Thus the total number of applications was 24. A small faint staining area was visible

when examined on Feb. 4, 1967. A second cryo-application was made to the staining area of the cornea. On Feb. 9, 1967, the staining of the cornea was gone. Recovery was uneventful.

Two other cases of chronic herpesvirus keratitis with stromal involvement, secondary iritis, and glaucoma did not respond

to cryotherapy.

Over 500 cases of herpesvirus keratitis have been treated with cryotherapy, according to a recent report.1 My personal series covers 18 cases of herpesvirus keratitis, and scattered reports have appeared elsewhere of single cases or smaller series. From this evidence, it appears that the use of cryotherapy in reducing the period of morbidity and in preventing visual disability from corneal scars produced by this disease equals in importance the advent of chemotherapy and antibiotic therapy in preventing loss of sight from bacterial infections of the cornea.

Summary

Cryosurgical instruments have become an important part of the armamentarium of the ophthalmologist. The ophthalmic surgeon uses controlled freezing to produce an adherent effect to extract cataracts; an inflammatory effect to seal a retinal hole; and a necrotizing effect to destroy tumors and other lesions. Recently a new use for cryotherapy has been described. In patients unresponsive to IDU and other antiviral agents and in whom chemical cauterization has also failed to produce a cure, the application of a cold probe in the recommended manner frequently produces recovery. Cryotherapy is less effective in deep stromal involvement, especially when complicated by secondary iritis and glaucoma. In fresh herpesvirus infections of the cornea of the superficial type, rapid recovery follows the freezing treatment.

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Monthly, in press.

The "Battered Child" And The Celiac Syndrome

By RALPH H. KUNSTADTER, M.D., MYRON H. SINGER, M.D. and Rose STEINBERG, M.S., A.C.S.W.

Gee in 1889 described a chronic disease of infants, children, and adults characterized by malnutrition, abnormal stools, and distended abdomen which he named celiac disease. Recently, di Sant' Agnese and Jones, in their excellent discussion of the celiac syndrome, stated that "celiac disease in the pediatric age group is a symptom complex of different disorders, distinct in etiology, course of illness and prognosis, and characterized by intestinal malabsorption."

"The common defect in all, is impaired intestinal fat absorption, and the clinical manifestations are, malnutrition, foul, bulky, greasy stools, and distended abdomen due to accumulation of improperly digested and inadequately absorbed food, flatulence, and in some, vitamin deficiencies."

We are adding another cause for the celiac syndrome which we believe should be added to di Sant' Agnese and Jones' classification (Table 1). We believe, as does Manson² that physical abuse, neglect, and/or emotional trauma may be responsible for the celiac syndrome and we recognize Manson's article as the first to describe this relationship.

Ever since Kempe et al³ dramatically described the "battered child syndrome" in 1962, a great deal of interest has been shown by the medical profession and the public as a result of extensive publicity through mass media. Child abuse and neglect are a major cause of infant and child mortality and morbidity.⁴ At present many states have legislation making it mandatory for hospitals, physicians and other professionals treating children to report instances

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of child abuse or neglect, factual or on suspicion, to a designated child welfare agency or law enforcement body for protection of the child, and when possible, aid (rehabilitate) parents, guardian or others responsible for the care of the child.

Case Report

J. S. was first brought to Michael Reese Hospital in April 1962 at the age of three years, nine months, at which time he was admitted because of petechiae and epistaxis

TABLE I

Disorders Which Give Rise to the Celiac Syndrome (Malabsorption) in Children¹

A. Principal Disorders Associated with Malabsorption

Gluten-Induced Enteropathy Idiopathic Celiac Disease Cystic Fibrosis of Pancreas Exudative Enteropathy

B. Conditions Frequently Causing Malabsorption

Chronic incomplete obstruction or other anatomical abnormalities of intestinal tract (malrotation, stenosis, blind-loop syndrome, fistula, extensive resection of small intestine, etc.)

Chronic parenteral infections (especially genitourinary tract)

Chronic enteric infections or infestations Oral antibiotics (especially neomycin) Lactase, invertase, maltase deficiency Gastro-intestinal allergy Acanthocytosis

C. Diseases Occasionally Giving Malabsorption

Tuberculosis of mesenteric glands, hypoparathyroidism, Gaucher's disease, Niemann - Pick's disease, ganglioneuroma, Riley-Day syndrome, biliary atresia, hepatic cirrhosis, ulcerative colitis, regional ileitis

and a complaint of weakness and pain in the lower extremities. A secondary complaint of chronic diarrhea and failure to grow was made which dated since the child was nine months old. He was a premature baby, cared for in the Premature Station at Michael Reese Hospital and Medical Center, with a birth weight of 3 pounds, 6½ ounces. He apparently did well until nine months of age when he developed diarrhea and vomiting and became dehydrated. The mother indicated that since that time he had been sick and failed to gain weight and grow properly. Foul smelling, bulky stools were frequent. At age two he was diagnosed as having cystic fibrosis of the pancreas with failure to thrive at another hospital in Chicago. The patient has two siblings, a fiveyear-old sister and a 20-month-old brother, both living and in good health.

Physical examination revealed a boy of three years, nine months who weighed 25½ pounds and was 33¼ inches long (Fig. 1). He had some petechiae in the left cheek and ecchymotic areas on both buttocks. A slight hypospadias was noted. Both testicles were in the scrotum. Otherwise, the physical examination appeared within normal limits. X-rays revealed healing fractures of the tenth ribs bilaterally.

Laboratory Studies

Platelet count, bleeding time, clotting time, and prothrombin time were all within normal limits. A mild normochromic, normocytic anemia was present. The serum proteins were normal. The blood urea nitrogen was normal. Both the vitamin A absorption and the sweat tests were within normal limits. Protein-bound iodine was 5.8 mcg. per cent and the alkaline phosphatase was normal. After a hospital stay of 12 days, he was discharged with the diagnosis of "battered child syndrome." A liberal diet was prescribed.

Investigation of the home environment was begun. An interview with the mother indicated that further evaluation of the relation between the mother and this child should be made. During the next four months he failed to gain weight and his mother complained frequently of his loose stools and failure to grow.

Second Admission

He was readmitted to the hospital at age four years, two months and during the fivemonth period had gained only one-half pound and had grown one-quarter inch. The purpose of this admission was to evaluate his failure to thrive. Records were obtained from the other hospital which revealed that at age two years, the child developed an episode of rapid weight loss, frothy stools and was admitted because of dehydration. After thorough studies were made he was placed on a gluten-free, starch-free diet and apparently did better, but continued to have delayed growth in the face of "voracious" appetite. He had occasional emesis and occasional upper respiratory infections with low-grade fever.

Physical examination revealed a child who was in the fiftieth percentile for a two-year-old for height and weight though his chronological age was four years, two months (Fig. 1). The child's abdomen was protuberant. The aforementioned hypospadias was again noted. The impression on this admission was malabsorption syndrome, to rule out cystic fibrosis and celiac disease.

Laboratory Studies

A repeat vitamin A curve was normal. Stools showed an increased amount of fat and starch. Electrocardiogram was within normal limits. X-rays of the chest, bone survey, upper gastrointestinal tract, small bowel and barium enema all were within normal limits. The bone age taken from films of the hands and wrists was estimated to be between 20 and 22 months. Skull x-rays appeared normal.

Developmental observations were done during this hospitalization over a three-day period. The child appeared to be within his age limit in adaptive, language and personal social areas. In the motor area, however, he seemed to be functioning at the level just under three years of age. The protein-bound iodide and I¹³¹ uptake failed to reveal evidence of hypothyroidism. However, it was felt that something might be gained by attempting a diagnostic trial of thyroid. With this in mind the child was discharged on dessicated thyroid, 30 mg. daily, to be kept on therapy for three months and then reevaluated. No change in his clinical status occurred.

Third Hospital Admission

At age of five years he was readmitted to Sarah Morris Hospital, this time because of acute dehydration with a history of four days of emesis of all ingested foods. He was treated initially with intravenous fluids and spent one month in the hospital. Laboratory studies revealed results similar to those of the previous admission. A methropyrapone test for pituitary and adrenal response was equivocal. On discharge, dessicated thyroid, 15 mg. and Winstrol,* 2 mg. twice daily were prescribed for three months.

His growth during the next several months was minimal and at five years, five months he was 35½ inches tall and weighed 29 pounds (Fig. 1). At this time he showed a severe bruise of the left elbow. His mother had "jerked his arm two days ago in a fit of temper." X-ray of the left elbow revealed no evidence of fracture.

Fourth Admission

In February, 1964, at the age of five years, seven months, the child was again brought to Sarah Morris Hospital because of a head injury. There were hematomas about one inch in diameter on the left forehead. His mother stated that he was smearing feces, and he was enuretic and encopretic. A psychiatric consultation was obtained. It was believed that the youngster suffered from a personality trait disorder and should not be accepted for out-patient care, but should be placed in a residential treatment center. This was refused by the parents.

Four months later at the age of five years, 11 months, he was again seen by the house physician because "he fell out of bed" and he was found to have bruises under the right eye and a right temporal hematoma. His abdomen was markedly distended and tympanitic. An electroencephalogram was obtained which showed slow basic rhythms and mild amplitude asymmetry in the right occipital area, representing a generalized depression of cerebral activity.

Fifth Admission

He was again admitted to Sarah Morris Hospital at the age of six years, one month, this time for jejunal biopsy. The results showed non-specific changes in morphology and no evidence of disaccharidase deficiency following enzyme analysis of biopsied tissue.

Because the home situation was uncontrollable, he was finally made a ward of the juvenile court and in April, 1965, almost three years after his first admission to Sarah

he had been doing well at the Healy School. He had had no bowel problems; there was no further diarrhea nor soiling. He had grown two inches and had gained three pounds in weight during eight months. He has been followed at bi-monthly intervals at the Pediatric Endocrine Clinic at Michael Reese Hospital and his last visit was in June, 1966, at the age of seven years, 11 months. He was 433/4 inches tall and weighed 443/4 pounds. This was a gain in weight and height of eight pounds and four inches, respectively, since his placement in the Healy School in a period of 14 months (Fig. 1). He is ready for second grade work in a public school. He has had no encopresis, enuresis, smearing or other psychological problems and seems very well adjusted to his new environment. Investigation by Department of Social Service It was necessary for the social worker to aggressively initiate and consistently followup on contact with the parents. It was then patient was exhibiting severe behavior prob-

Morris Hospital, he was admitted to the

William Healy Residential Treatment Cen-

ter for Emotionally Disturbed Children, under the auspices of the Department of

Mental Health, State of Illinois. He was

seen at the Out-Patient Clinic three months

later at the age of seven years. At that time

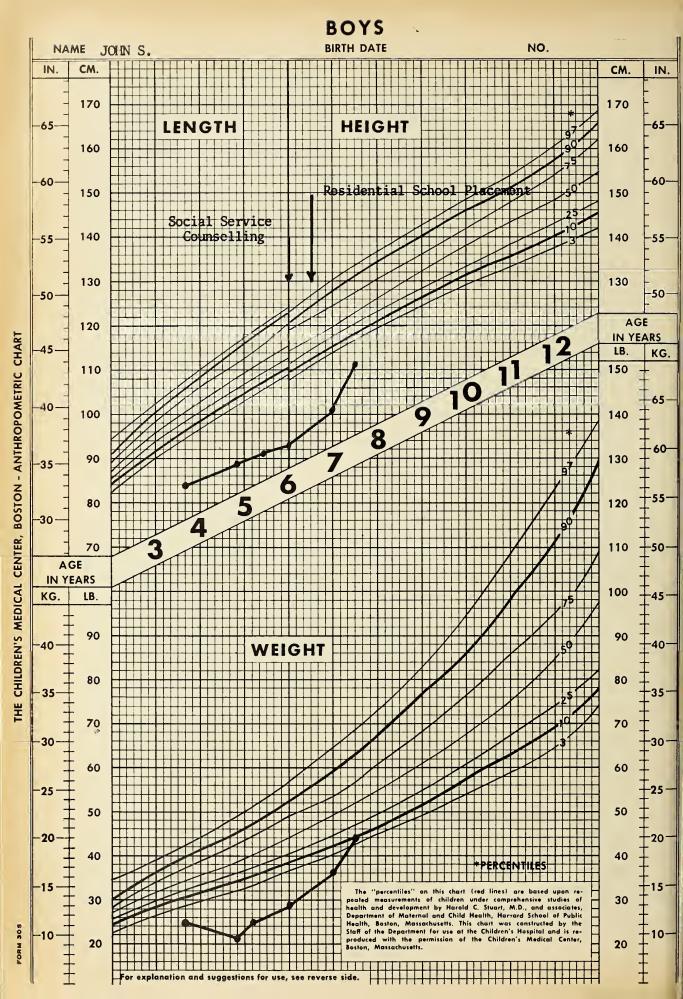
aggressively initiate and consistently followup on contact with the parents. It was then learned, that since the age of four years, the patient was exhibiting severe behavior problems. He was enuretic and encopretic, however, only at home. He soiled and smeared, admittedly out of rage. The parents described the child's voracious, excessive compulsive eating, including inedible foods such as raw frozen meat and raw noodles. He slept poorly and according to the father, prowled through the house at night "like a nocturnal foraging animal."

The child attended kindergarten, but was making a very poor adjustment. He refused to comply with any academic demands. In behavior he was said to be generally withdrawn and submissive. They, too, observed his inordinate interest in food. Psychological tests indicated he was of normal intelligence.

ence. Extended exploration with the parents

revealed both came from emotionally deprived unstable homes. The father drank to excess and was physically abusive to the child's mother. The latter was given to bizarre distortions and acting out sexually.

^{*} Stanozolol, Winthrop Laboratories



Although she verbalized a need and wish for help with her personal and marital problems, she was unable at that time to involve herself in a treatment relationship outside of dealing with the child's problems.⁵

The patient is the middle of three children, having an older sister and younger brother. Although not too much is known about the siblings, it is fairly clear that the mother identified the child with her brother who was born with many anomalies, and who died at two and one-half years of age. The mother when speaking of the patient frequently referred to him as "not normal."

Both parents readily acknowledge their inability to cope with the boy's behavior, and were obviously relieved when placement in a residential treatment facility was recommended. The parents also accepted the need for Family Court guardianship, to insure this placement as well as future

planning.

Since the boy's placement out of the home a year and a half ago, he has himself said proudly, "I growed." Not only has there been a growth spurt but there has been a diminution of the physical symptomotology and a little evidence of the gross behavior problems exhibited when in his home. Likewise, the patient has progressed academically so that he will enter the third grade at the opening of the fall semester.

Overall, the patient has made such a rapid adjustment, residential placement is no longer necessary, and it is planned to refer

him for foster home placement.

It seems that the child's severe behavior problems were his only way of calling attention to the physical and emotional abuse he suffered in the parental home.

Comments

It is well known that failure to thrive may result from disease, inadequate food intake, voluntary, or as a result of imposed starvation, and maternal deprivation. 6, 7, 8 However, Manson apparently was the first to describe the celiac syndrome associated with parental abuse and neglect. 2 In 1958 and 1959, he encountered three children who showed the usually accepted criteria for the celiac syndrome and also were found to be victims of parental abuse or neglect. 2 One patient did not recover until he was old enough to obtain the food he needed; the second recovered after being placed in a boarding home, and the third was due to

food deprivation, with recovery following adequate food intake.²

Our experience was similar to that of Manson, in that a diagnosis of celiac syndrome was made in his three cases and in ours initially, and only after weeks and months was it appreciated that the histories of the patients were false or that the causal relationship to physical abuse or neglect was present at the onset.

As a possible explanation for the celiac syndrome in starvation, Trowell and Jellife concluded that serum albumin in starvation is partly a reflection of liver dysfunction. Also in severe malnutrition, there may be a failure or diminution of pancreatic and other digestive enzymes which may account for the chronic diarrhea and undigested food in the stools resulting in the clinical picture of the celiac syndrome.⁹

Also in our patient, severe emotional disturbances including anxiety, fear of his mother and resentment, may have been significant factors in the cause of his steatorrhea and voluntary soiling. 6, 7, 8 Prugh 10 in writing on the emotional factors in idiopathic celiac disease reported 14 cases of celiac disease studied psychologically. "A consistent, though nonspecific personality type of an anxious, rigid, moderately compulsive nature was noted among the mothers of these children. He found a disturbed mother-child relationship; ambivalent feelings of the mother to the child were often reflected in feeding practices and handling." There was also evidence of a consistent though nonspecific emotional disturbance in the celiac child, characterized by a conflict of unexpressed resentment and anger toward the mother, on the one hand, and increased need for affection and support, on the other. Supportive psychotherapy to six of the mothers resulted in recovery in the child. In no case was a gluten-free diet utilized.10 Prugh subsequently found personality and emotional factors present in a number of instances of adult idiopathic steatorrheas and believed that most of them had been celiac children, and that psychosomatic disturbances preceded the celiac syndrome. 10 Paulley also studied emotion and personality in the etiology of steatorrhea and came to similar conclusions.11 Certainly, in our patient these factors were important, and there may have been enzyme deficiencies resulting from starvation and/or emotional disturbances resulting in the celiac syndrome although we were not able to document this contention in our studies.

Regardless of the pathologic physiology in our case and those of similar description, the fact that removal of the children from the source of abuse or neglect, institution of adequate food intake and no medical therapy, followed by satisfactory growth and development, both physically, mentally, and emotionally, is sufficient proof that physical abuse or neglect may have an etiologic relationship to the celiac syndrome. Therefore, from our experience, and that of Manson, we believe that physical abuse or neglect should be considered in the many causes for the celiac syndrome.

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LSD EXPERIENCE

In general, the LSD experience consists of changes in perception, thought, mood and activity. Perceptual changes involve senses of sight, hearing, touch, body image and time. Colors seem to intensify or change, shape and spatial relation appear distorted, objects seem to pulsate, two-dimensional objects appear to become three dimensional and inanimate objects seem to assume emotional import. Sensitivity to sound increases but the source of sound is elusive. Conversations can be heard but may not be comprehended. There may be auditory hallucinations of music and voices. There may be changes in taste and food may feel gritty. Cloth seems to change texture, becoming coarse and dry or fine and velvety. The subject may feel cold or sweaty. There are sensations of lightheadedness, emptiness, shaking, vibrations, fogginess. Subjects lose awareness of their bodies with a resultant floating feeling. Arms or legs may be held in one position for extended periods of time. Time seems to stop, race, slow down or even go backwards. Changes in thought include a free flow of bizarre ideas including notions of persecution. Trivial events assume unusual significance and importance. An inspiration or insight phenomenon is claimed by some LSD adherents.

The mood effects of LSD run the gamut. There may be bursts of tears, of laughter, or the subject may feel no emotion at all. A state of complete relaxation and happiness, not apparent to an observer may be experienced. A feeling of being alone and cut off from the world may lead to anxiety, fear and panic. Accordingly, the LSD session is frequently monitored by an abstaining LSD-experienced friend to prevent flight, suicidal attempts, dangerous reaction to panic states, and impulsive behavior, such as disrobing. There may be a feeling of enhanced creativity, but this subjective feeling rarely seems to produce objective results.

Drug Abuse: Escape to Nowhere: Publ. by Smith, Kline & French. 1967.

Massive Bilateral Adrenal Bleeding: Five-Year Review Of Cases

By Juraj Jagatic, M.D., and M. E. Rubnitz, M.D./Hines

The description of adrenal hemorrhages goes back in literature as far as 1670 ¹⁻⁴, but it was not until 1911, when Waterhouse compiled all of the recorded cases and gave detailed descriptions. In 1918, Friderickson^{1, 2, 5} again reviewed and summarized the literature. Since that time, the name "Waterhouse-Friderickson Syndrome" has been used to describe symptoms occurring in meningococcal septicemia, general toxemia, and acute adrenal insufficiency.

Subsequent research with animals³ and observation of patients¹⁻¹¹ proved that there are many different causes to be blamed as etiology for these fatal conditions.

In 1951, Proctor and Rawson³ treated experimental animals with massive doses of ACTH and found that corticosteroids may increase the sensitivity of the adrenal cortex, thus leading to necrotic degeneration and massive bleeding.

Berte⁸ in 1953 summarized the etiology of adrenal bleeding into four groups. The first group is associated with involution or destruction of glands, as in new-born babies and post-partum. The second group is associated with capillary wall damage, including toxemia. The third group is associated with different hemorrhagic disorders and the fourth with adrenal vein thrombosis and infarction.

In 1955 Altschule⁶ described massive bilateral adrenal bleeding after electric shock therapy. He offered the explanation of a possible irritation of the cortex by the electric current. In 1958 Junghaus⁵ collected from the literature sixty cases of massive adrenal hemorrhage occurring in pregnancies or as a complication of delivery.

In 1963 Reese reviewed 14 cases of mas-

sive adrenal hemorrhage on the basis of anticoagulant therapy and reported a case of his own.

In the five-year review of cases from the Veterans Administration Hospital at Hines, there were 67,978 admissions with 7,240 deaths and 3,793 autopsies. In reviewing all of the autopsies, we found 12 cases in which the patient died from massive bilateral adrenal hemorrhage. In one case the patient was on a high dose of heparin following myocardial infarction, and bleeding was attributed to anticoagulant therapy. In two cases the patient received high doses of cortison, and the bleeding was attributed to the drug therapy. One case had aortic aneurysm with apparent arterial and venous thrombosis in the adrenal vessels as the cause of bleeding. There were three cases of sepsis. The largest group of five cases was associated with direct or indirect brain

We would like to present short summaries of these cases:

CASE NO. 1

The first case was a 72-year-old male with signs of intracranial pressure for several months. One month before he died he had



Fig. 1. Case No. 1 gross specimen, adrenal glands, showing massive bilateral bleeding.

From The Laboratory Service at the Veterans Administration Hospital, Hines, 60141

a craniotomy, and a large hemorrhagic cyst in the right frontal lobe was found. Surgery was done elsewhere. Immediate postoperative course was good and without complications. The patient was transferred to our hospital. Two days before he died, he went into shock which was not explained clinically. At the autopsy it was found that massive bilateral adrenal bleeding had occurred, without any signs of infection or traumatic shock. The area of brain in both frontal lobes showed large bleeding.

CASE NO. 2

This was a 63-year-old male with a long history of alcoholism and of tuberculosis. He was treated for several CVA's and recent spread of the tuberculosis. Before death he had signs of intestinal obstruction in the right lower quadrant, and because of the grave condition he was in, only colostomy was done. Four days after surgery, he died in a state of shock. Cause of death—massive bilateral adrenal hemorrhage. There was massive hemorrhage in the pons and the signs of the old CVA's in right frontal lobe.

CASE NO. 3

This was a 68-year-old patient with a history of slowly increased intracranial pressure and verification of meningioma located on the right inferior sphenoid wing. He had surgery, but because of the location, only biopsy was done. After surgery he had irradiation. Little less than a month after surgery he died with massive adrenal bleeding.

CASE NO. 4

Twenty years before he died, this patient had surgery for pituitary adenoma. Adenoma was removed, and he was on substitutional hormonal therapy for twenty years. Later, it was proven that the patient had a cyst in the area of the surgery. Five days before death, he was involved in a car accident with severe traumatic injuries, such as fracture of the patella, supracondylar fracture of right femur. He was transferred into the hospital, treated for traumatic shock, but did not respond to the usual therapy and died five days after admission. Cause of death-massive bilateral adrenal bleeding. This case could be discussed as a possibility of traumatic injury of adrenal, but at autopsy there was no mention of, or sign of, trauma or injury in the kidney areas.

CASE NO. 5

This case was a chronic alcoholic with far advanced cirrhosis, and he died in a state of shock. Cause of shock was bilateral, massive adrenal bleeding. The autospy, besides the far-advanced cirrhosis, revealed that patient had multiple degenerative changes through the brain, the most prominent being in cerebellum with complete disappearance of purkinje cells.

Analyzing some of the reported cases from literature2, 9, 10 we found that each of them either had massive injury to the skull with subdural hematomas, CVA, or autopsies had not been done on the head.10 These statistical analyses make us believe that direct mechanical irritation of hypothalmus and pituitary gland, or indirect irritation, as edema, hemorrhage, tumor or surgery, may finally result in massive bilateral adrenal hemorrhage and death. We therefore suggest that a fifth group be added to the classification. We believe that just being aware of this mechanical irritation theory would help to save some patients.

Summary

In the five-year review of the autopsy material from the Veterans Administration Hospital at Hines, 12 cases of massive bilateral adrenal hemorrhage were found. Significant statistical results from the autopsy material have been used to offer additional explanation of the cause of massive bilateral adrenal hemorrhages. Berte's classification of four groups should be extended to add a fifth group—direct irritation of the hypothalmus due to intracranial surgery, injury or disease.

TABLE I

3,793 autopsies in five years with 12 cases of bilateral massive adrenal hemorrhage ORIGIN OF MASSIVE BILATERAL ADRENAL HEMORRHAGE IN 3,793 AUTOPSIES DURING FIVE YEARS IN VETERANS ADMINISTRATION HOSPITAL, HINES, ILLINOIS

11031 TTAL, TIMES, ILLINOIS	
Peritonitis	2
Venous Thrombosis	1
Empyema	l
Cortison Therapy	
Heparin Therapy	
Spontaneous Adrenal Bleeding	
Connected with Brain Damage	5
	_

12

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Political Psychiatry: Strategy

The grand strategy of the War on Mental Illness is to convert medical problems into sociological ones by concentrating on environmental stress as a cause of illness. The sociological problems are then reinterpreted as political problems with social action in the form of voting as the ultimate force. (During elections the issue can be stated as being for or against illness.) The political psychiatrist sees the developing strategy; by judiciously riding the wave of social change he can control the mounting political force with a combination of technical authority, careful planning, political acumen, and, as always in war, a bit of luck. Medical Opinion and Review (April) 1967.

Screening and the Practice of Medicine

Life, however, is not as simple as the ideal, and the full complexity of early detection is only now becoming apparent. For most diseases, our knowledge of their natural history only tells us that, in a population, the group with a high level in some variable-weight, blood-pressure, serum-lipids, and so on-have a higher risk of developing a certain disease within a period of years than those with a low level. There is usually no defined cut-off point below which the disease will definitely not occur, and there may well be no more definitive test applicable to those in the high range. A further test, or series of tests, may also be inconclusive. In screening, therefore, division into positives and negatives must be made at an arbitrarily selected point: if the point is at a low level, there will be few false negatives and many false positives; if at a high level, these results will be reversed. There may be no definitive method of separating the positive into true and false. Any treatment will have to be given to all the positives and inevitably will be given unnecessarily to some of them. Moreover this is not a temporary situation which further research will clarify. It is exceedingly unlikely that the ideal situation will ever be achieved, since early detection is concerned with a changing and not a static process of disease development. The grey area of uncertainty will probably always be large, and clinical judgment and skill will be especially required in handling patients in this zone. Probably the clinician can only decide whether a disease-process is at work by considering the level of a variable in relation to previous levels in that individual. The clinician may have to relate the latest screening information on an individual to data going back over years and to base his decision about intervention on his interpretation of these and other data about the patient. Editorial-The Lancet (July 8) 1967.

Glossary of Chromosomal and Genetic Terms

By JACK P. COWEN, M.D.

PART III

Note: Because of its length, this Glossary is being presented in three parts. The first section was published in the July issue of the Illinois Medical Journal, continued in the August issue, and is concluded in the current issue.

Somatic Mutation: A mutation which involves a somatic cell and its daughter cells, that is, only a part of the organism. According to one hypothesis, some tumors are regarded as consequences of somatic mutation.

Specificity: A gene which can have quantitatively differentiated effects in different individuals has a low "specificity." Since this practically never occurs, the expression can be dispensed with. The high degree of specificity of gene effects is a matter of general experience in human genetics.

Spindle: A fusiform bundle of delicate filaments appearing at the beginning of the metaphase stage of cell division. It extends from the centriole of one pole of the dividing cell to that of the other. Some of the spindle fibres are continuous from pole to pole, while others are attached to the chromosomes at their respective centromeres. The latter fibres may be responsible for bringing the chromosomes onto the metaphase (equatorial) plate.

Submedian: This refers to the location of the centromere of a chromosome at a point elsewhere than at the center, or near the end.

Supernumerary Chromosome: One or more extra chromosomes found inconstantly in wild populations of certain species of animals. They are not homologous to members of the regular set of chromosomes and they apparently exert little influence on the phenotypic effect. Certain supernumerary

chromosomes frequently exhibit non-disjunction leading to their elimination from germinal as well as from somatic cells.

Synapsis: The period in meiosis in which the two members of every pair of homologous chromosomes are in very precise and intimate apposition. This occurs during prophase of the first meiotic division and implements the mechanism for the segregation and exchange of the maternal and paternal derivatives of every chromosomal pair. (Fig. 1.) The extent of synapsis between the heteromorphic sex chromosomes, X and Y, is less well understood and varies in different species. In man, there is little if any normal pairing between the X and Y chromosomes, suggesting the absence of true homology between them.

Syngamy: In sexual reproduction, the union of germ cells (gametes) at fertilization to produce a new individual, a ZYGOTE.

Telophose: The final phase of cell division during which the chromosomes regroup into a nuclear structure and are gradually transformed into long thread-like fibers enclosed by a nuclear membrane.

Tetraploid: An organism containing four complete sets of each kind of chromosome characteristic of the species. Thus, the tetraploid number in man is 92. See EUPLOIDY, POLYPLOIDY.

Trisomic: An aneuploid (hyperploid) individual in whom a chromosome is present in triplicate, rather than in the normal double or disomic number, or condition. The abnormal number of chromosomes results from meiotic NON-DISJUNCTION (failure of the members of a pair of homologous chromosomes in the first meiotic di-

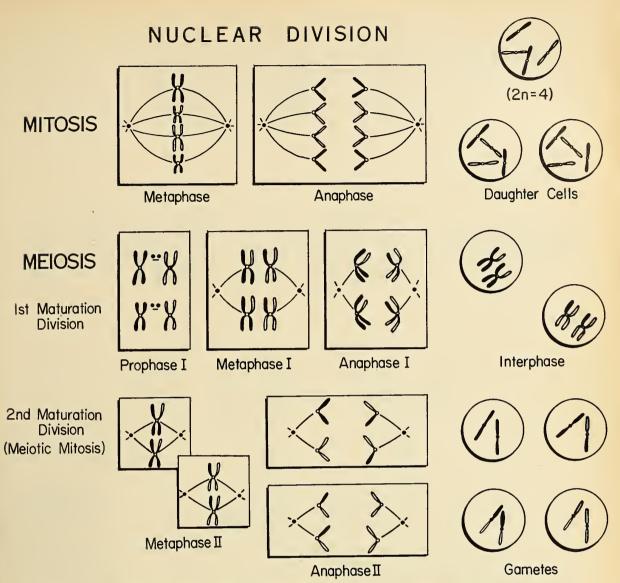


Fig. 1. (After Sohval) Highly schematic representation of the distinguishing features of mitotic and meiotic division. The parent cells contain two pairs of chromosomes, the dark and light members of each pair being derived from the mother and father respectively. In mitotic metaphase, each chromosome is reduplicated and arranged separately on the equatorial plate. During anaphase, the longitudinal halves of the chromosomes separate and pass to opposite poles producing daughter cells whose chromosomal constitution is identical with the parent cells. At metaphase of the first meiotic division, the reduplicated members of each homologous pair are together in synapsis on the equatorial plate. Exchange of chromosomal material (crossing over) has just taken place during prophase. During anaphase, whole reduplicated chromosomes of each pair diverge poleward to produce daughter eells containing half the diploid number. Metaphase of meiosis II is essentially mitotic in character, resulting in gametes containing the haploid number of chromosomes, but with varying compositions of parentally derived chromosome material.

vision, or of the longitudinally-doubled chromosomes in the second division, to separate at anaphase), as a result of which one gamete contains both members of the pair ("n" plus 1). When this abnormal gamete unites at fertilization with a normal germ cell (containing the haploid or "n" number), the resulting zygote has a 2"n" plus 1

chromosomal constitution and the individual is therefore trisomic for the nondisjunctional chromosome. See ANEU-PLOIDY.

Translocation: A type of aberration characterized by fragmentation of a chromosome and transfer of the broken-off portion

PROPHASE WETAPHASE WETAPHASE

CENTRIC FUSION

Fig. 2. (After Sohval). (Top) Diagram illustrating reciprocal translocation involving the exchange of parts of non-homologous chromosomes early in prophase. (At this stage, the chromosomes are actually threadlike, longer and longitudinally reduplicated). (Middle) Diagrammatic representation showing how the morphology and composition of two pairs of homologous chromosomes at metaphase is altered by reciprocal translocation. The resulting dissimilarity (in size and centromere position) between original members of the two homologous pairs is a potential source of error in the identification of individual chromosomes during karyotype analysis. (Bottom) Schematic illustration of the mechanism of CENTRIC FUSION. This is a special type of reciprocal translocation involving non-homologous acrocentric chromosomes. Breakage close to the centromere occurs in the short arm of one chromosome and in the long arm of the other. Of the two newly produced chromosomes, one is necessarily a minute fragment which is usually lost in subsequent cell division.

to another chromosome, often of a different pair. This phenomenon is usually RECIP-ROCAL, involving breakage of two chromosomes with mutual interchange of the fragments. (Fig. 2.) Reciprocal translocation, with the exchange of parts by two chromosomes belonging to different pairs differs from CROSSING OVER in that the latter involves the exchange of HOMOLOGOUS segments of HOMOLOGOUS

chromosomes. (Fig. 1.) The two new (translocated) chromosomes will survive and function if each possesses a single centromere. If a translocation-produced chromosome lacks a centromere, or if it should have two centromeres, it will not survive because proper separation during anaphase of a subsequent cell division will not occur. Triploid: An organism containing three complete sets of each kind of chromosome

characteristic of the species. Therefore, the triploid number in man is 69. See EUPLOIDY, POLYPLOIDY.

Zygote: In bisexual organisms, this is the cell resulting from the union at fertilization of two germ cells. The formation of the zygote restores the normal diploid condition by combining the haploid number of chromosomes present in each of the gametes.

Recent Technical Advances

Until very recently, the study of human chromosomes had been hampered by the fact that in standard histological preparations these small structures tend to be clumped together and to overlie one another. Under such conditions, it is often difficult to establish an accurate count and

quite impossible to identify the chromosomes according to their morphological characteristics. Since chromosomes can be recognized as such only during nuclear division at or near the metaphase, newer techniques had to be devised to analyze the chromosomal constitution of somatic as well as germinal cells with greater accuracy. These procedures involved (1) the use of short-term cell cultures which provide growing and actively dividing whole cells with no distortion, loss or addition of cellular material by sectioning; (2) the use of hypotonic solutions to produce swelling of the cells with dispersion and contraction of the chromosomes; (3) treatment of the cell culture with colchicine, arresting mitosis at the metaphase and so enhancing the number of cells suitable for examination; and

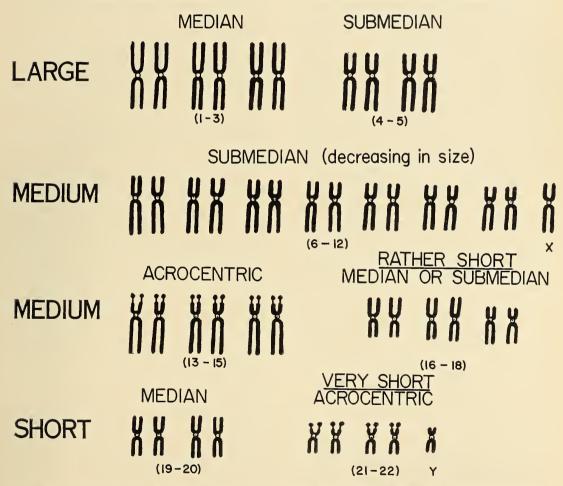


Fig. 4. (After Sohval) Idiogram of normal human male with 22 pairs of autosomes and an XY sex-chromosome constitution. The chromosomes are arranged in seven groups (A to G), according to their length and centromere prosition. The classification is a slight modification, after Pateau, of the international system of nomenclature of human mitotic chromosomes adopted in 1960 in Denver, Colo.

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(4) careful squashing to separate the individual cells, or air-drying to spread the chromosomes. Camera lucida drawings and photographic prints at a magnification of 3000 diameters make it possible to sort and match in pairs the individual chromosomes. The culture periods for bone marrow is several hours, for circulating leucocytes from the peripheral blood, three days.

A generally accepted system of nomenclature was reached by the Denver Cytological Congress in 1960 and bears the name of this organization. By the Denver system, the pairs of non-sex chromosomes or autosomes are numbered 1 to 22 in descending order of length. The sex chromosomes are placed near to but separate from the groups of autosomes that they resemble. The twentytwo autosomal pairs are classified into several readily distinguishable groups. (Fig. 4.) The grouping of the chromosomes is further determined by whether the centromere is median, submedian, or acrocentric (nearly terminal) in location. In the last instance, such chromosomes have a "wishbone" apearance. In technically optimal preparations, a distinction can be made between most if not all chromosomes, although considerable difficulty may be experienced in distinguishing those of the largest group (6-12, including the Xchromosome). The presence of a satellite on the short arm of all acrocentric chromosomes assists in the identification of these structures. The X- chromosome resembles the longer chromosomes in group 6-12, especially chromosome 6, from which it is difficult to distinguish. The Y- chromosome is similar to the very short acrocentric chromosomes of group 21-22, but lacks a satellite.

The identifying characteristics of the seven groups of human mitotic chromosomes are outlined as follows ("Denver" system):

Group 1-3: Large chromosomes with approximately median centromeres. The three chromosomes are readily distinguished from each other by size and centromere position.

Group 4-5: Large chromosomes with submedian centromeres. The two chromosomes are difficult to distinguish, but chromosome 4 is slightly longer.

Group 6-12: Medium sized chromosomes with submedian centromeres. The X-chromosome resembles the longer chromo-

somes in this group, especially chromosome 6 from which it is difficult to distinguish. The large group is one which presents major difficulty in identification of individual chromosomes.

Group 13-15: Medium sized chromosomes with nearly terminal centromeres ("acrocentric" chromosomes).

Group 16-18: Rather short chromosomes with approximately median (in chromosome 16) or submedian centromeres.

Group 19-20: Short chromosomes with approximately median centromeres.

Group 21-22: Very short, acrocentric chromosomes with satellites. Chromosomes 21 and 22 have satellites on their short arms. The Y- chromosome is similar to these chromosomes, but without satellites.

It is important to bear in mind that fact that while the mere counting of a number of chromosomes in a group of nuclei is a relatively simple matter, the matching of homologous pairs, the identification of each individual chromosome, and the interpretation of abnormalities is generally quite difficult and often taxes the skill and ingenuity of experienced chromosomal cytologists.

Genetic Mechanisms Causing Human Chromosomal Abnormalities

Cytogenetic mechanisms responsible for chromosomal aberrations have been conclusively demonstrated in lower forms but not yet in man. Nevertheless, rapidly accumulating casuistic data suggest similar origins for various abnormal human karyotypes. Essentially, the latter consist of deviations from the normal structure and number of chromosomes which frequently result in genic rearrangements and in phenotypic variations. Easily recognizable changes in the structure of chromosomes may be the result of TRANSLOCATION or DELETION, DUPLICATION or ISO-CHROMOSOMAL FORMATIONS. IN-VERSION is a type of structural change which is not apparent morphologically, being detected primarily by studies of hereditary transmission. Variations in the number of chromosomes are usually due to NON-DISJUNCTION, or anaphase lag.

Human chromosomal aberrations are due either to disturbances in meiotic behavior in the parent (with the formation of abnormal gametes and zygotes) or to mitotic errors during the embryological developments of a normal zygote. In some instances, chromosomal variations may represent the combined result of deviations occurring before and after fertilization.

The following commentary is limited to some of the morphologically demonstrable variations in the normal karyotype and their clinical implications. No attempt is made to deal with the highly speculative consequences in man of those mechanisms concerned with crossing over, duplication, deletion, inversion or linkage of genes.

Translocation. This type of chromosomal aberration results when a chromosome breaks and a fragment becomes attached to another chromosome, often to another pair. When breakage occurs in two chromosomes, the mutual interchange, with reuniting of the fragments, is called RE-CIPROCAL TRANSLOCATION. (Fig. 2.)

Reciprocal translocation, with exchange of parts of two chromosomes belonging to different pairs, differs from CROSSING OVER in that the latter involves the exchange of HOMOLOGOUS segments of HOMOLOGOUS chromosomes. The two new (TRANSLOCATED) chromosomes will survive if each possesses a single centromere since the latter is vital to proper separation during anaphase. If a translocation-produced chromosome lacks a centromere, or if it should have two centromeres, it will be eliminated at a subsequent cell division since proper anaphase cell separation is impossible.

When translocation occurs in somatic cells during embryogenesis, its effects are incapable of hereditary transmission although they may persist in a clone of cells. Therefore, the presence of a translocationproduced chromosome in the nuclei of different tissues at the time of karyotype analysis presupposes that it was transmitted intact from one of the parents or that it had originated during gametogenesis in either parent. An alternative possibility would be the occurence of translocation during or after the first mitotic division of a normal zygote. Under these circumstances, survival of the genotypically different daughter cells would result in mosaicism.

Centric Fusion. This variety of chromosomal aberration occurs if each of the in-

volved chromosomes is broken acrocentrically very close to its centromere so that exchange of entire, or almost entire chromosome arms takes place ("whole arm" translocation). When breakage occurs in the long limb of one chromosome and in the short limb of the other, transposition of the arms produces a large submedian chromosome and a minute element containing a centromere and a very short region on either side. (Fig. 2.) Since each new chromosome possesses a centromere it is potentially viable. However, the minute fragment (because of its size and predominantly heterochromatic composition) tends to be lost in subsequent divisions. Thus, centric fusion followed by loss of the tiny element leads to a decrease in the basic chromosome number.

Non-Disjunction. The most frequent cause of variations in chromosome numbers is an abnormal movement of chromosomes during nuclear division. (Fig. 5.) Normally, the chromatids (longitudinal halves of a chromosome) separate during mitotic anaphase and the daughter chromosomes migrate to opposite poles of the dividing cell. The same process takes place during anaphase of the second (equational) meiotic division. However, during anaphase of the first or reductional meiotic division, separation occurs between each homologous pair rather than between the chromatids of individual chromosomes. Failure of the members of a chromosome pair to separate (disjoin) during anaphase is known as non-disjunction. The phenomenon results in both chromosomes passing into the same nucleus, in which event the other cell receives neither member of the pair. As it is presumed to occur in man, non-disjunction usually involves only one chromosome, although two are implicated. The resulting individual with an irregular number of chromosomes is an ANEUPLOID, having one or two more or less than the basic number of chromosomes, i.e., 47, 48, 44 or 45.

Non-disjunction occurring during maturation of the germ cell causes an extra chromosome to be present in one gamete (which now has the haploid number of 23 plus 1) while the other gamete is lacking in this chromosome (having the haploid number of 23 minus 1). When these gametes unite at fertilization with a normal gamete, individuals with forty-seven or

ANAPHASE **METAPHASE** NORMAL NON-DISJUNCTION

SIMPLE LOSS

Fig. 5. (After Sohval) Chromosome movement in cell division. (Top) During "normal" metaphase the longitudinally-doubled chromosomes are arranged in the midline equatorial plate. A chromosomal fiber extends in opposite directions from the centromere of each chromosome to the opposing centrioles. In anaphase the halves (chromatids) of each chromosome separate and are known as daughter chromosomes. They migrate to opposite poles of the cell, presumably being drawn there by their respective centromeres. (Middle) NON-DISJUNCTION is characterized by the failure of the daughter chromosomes to separate (disjoin) during anaphase. Instead, both migrate to the same pole of the anaphase nucleus. As a result, one daughter cell receives an extra chromosome while the other cell becomes deficient in this chromosome. (Bottom) SIMPLE LOSS of a chromosome is sometimes due to the failure of a metaphase chromosome to become oriented on the equatorial plate, Apparently, the centromere of one but not of the other member of a pair of chromatids is effective in drawing its daughter chromosome towards the pole of the anaphase nucleus. The daughter chromosome with the inactive centromere fails to migrate to the uncleus of either daughter cell. It remains in the cytoplasm where it eventually disintegrates.

forty-five chromosomes, respectively, are formed. The former individual is TRI-SOMIC, and the latter is MONOSOMIC for the particular chromosome involved.

Mosaicism. The presence of genetically dissimilar cells in adjacent tissues of an individual is known as mosaicism. When present in plants (usually as result of a graft) this condition is referred to as a CHIMERA. Thus far, two forms of mosaicism have been recognized in man. This first one, termed ERYTHROCYTE MO-SAICISM, occurs in fraternal twins and is characterized by the presence of two distinct blood groups (A and O) in one individual. The finding of "drumsticks" (indicative of a female genotype) in the male twin in several cases strongly suggests that white as well as red cells may participate in this type of mosaicism. In this event the condition would be more properly designated as a BLOOD MOSAIC or CHIMERA. The second is a heterogeneous group of patients with anomalous sex development in whom somatic cells contain sex chromosome complements of more than one type (SEX MOSAICISM).

The occurrence of mosaicism means that the body contains two or more stemlines of cells with different chromosome numbers or constitution; in other words, the genetically dissimilar cells are the progeny of different ancestral cells which have developed separate stem-lines.

Karyotypes In Various Morbid States

Many of the chromosomal aberrations are susceptible to more than one interpretation. On the other hand, the finding of a normal chromosome constitution in a given clinical disorder does not exclude the possibility that a chromosomal aberration may nevertheless exist. The principal disorders in which chromosomes have been analyzed may be grouped as follows: (1) a rather large variety of sexual anomalies, (2) individuals, usually oligophrenic, with more than two X chromosomes, (3) mongolism, (4) an heterogeneous assortment of conditions exhibiting congenital anomalies, and (5) leukemia. In the majority of instances, there is no close correlation between karyotypes and disease patterns. Although pathogenetic mechanisms are properly to explain most of the demonstrated chromosome abnormalities, it must be emphasized that precise etiological factors are seldom ascertainable.

Sexual Anomalies. In itself, karyotype analysis in individuals with congenital errors of sexual development is of great interest, but in addition it has shed new light on the derivation of the nuclear sexchromatin body of Barr. In fact, the discovery of discordances between the nuclear and phenotypic sex, i.e., chromatin-positive Klinefelter's syndrome and chromatinnegative Turner's syndrome and testicular feminization, provided an early impetus to application of the newer technics for chromosome study in clinical problems of aberrant sexual development. Data yielded by complementary karyotype and sex chromatin studies bring us ever closer to the ultimate elucidation of the pathogenesis of various poorly understood sexual disturbances.

Pseudohermaphroditism. In this type of abnormal sexual development, elements of both sexes are present in the genital tract but the gonads are either testes or ovaries. In the former instance, the condition is referred to as male, and the latter as female pseudohermaphroditism. In either case the nuclear sex chromatin pattern is concordant with the gonadal sex. Similarly, the sex chromosome complement appears to correspond to the type of gonads present. In both types the modal chromosome number is the normal forty-six, the XY complex being present in male pseudohermaphrodites and the XX in the female variety, with rare exceptions.

A special variety of male pseudohermaphroditism, known as TESTICULAR FEMINIZATION, is of particular interest because these phenotypic females often escape detection until they are well on in adult life. Despite the fact that they have undescended testes and primary amenorrhea, the external genitalia are feminine, there is normal breast development, a feminine habitus (except for scant or absent pubic and axillary hair), and they are capable of sexual intercourse and orgasm. The fact that the chromatin-negative nuclear sex is at variance with the phenotypic sex is the reason why the sex chromatin pattern should be determined routinely in all women with primary amenorrhea.

PATERNAL

MATERNAL

PARENTS (XY) (XX) (XX)

Normal Abnormal Normal Abnormal

GAMETES (X) (Y) (XY) (O) (X) (X) (XX) (O)

SPERM	.	OVUM					
	X	X XX					
×	XX	XXX	XO				
	NORMAL FEMALE	TRIPLE X FEMALE	TURNER'S SYNDROME				
	XY	XXY	YO				
Υ	NORMAL MALE	KLINEFELTER'S SYNDROME	S VIABLE?				
	XXY	XXXY	XY				
XY	KLINEFELTER'S SYNDROME	TRIPLE X MALE	NORMAL MALE				
0	XO	XX	00				
	TURNER'S SYNDROME	NORMAL FEMALE	VIABLE?				

Fig. 6

It is probable that gene mutations are primary causes in most if not in all cases. Analysis of familial cases of testicular feminization which is transmitted through the maternal line and occurs only in offspring with testes, suggests that the condition is associated with or caused by a sexlinked recessive or a sex-limited autosomal dominant gene.

True Hermaphroditism. This type of intersex possesses male and female elements not only in the genital tract but in the gonadal tissue as well. Such individuals have testes and ovaries, or ovotestes with or without a testis or an ovary, Approximately two-thirds of nearly fifty patients so reported are chromatin-positive and one-third chromatin-negative. As in

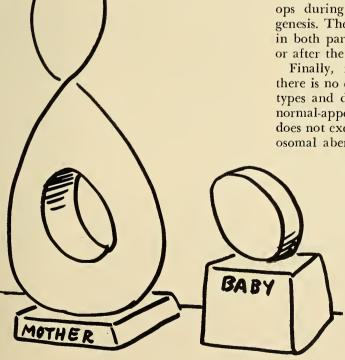
pseudohermaphroditism, the absence of an obvious chromosomal anomaly in true hermaphroditism does not eliminate the possibility of its existence.

Klinefelter's Syndome. (Fig. 6) Individuals with this disorder are phenotypic males with anatomic derangements (sclerosing tubular fibrosis, seminiferous tubular dysgenesis, microorchidism) and functional impairment (sterility, androgen deficiency) of their testes. Azoospermia and small testes with marked lesions of the seminiferous tubules are the rule. Its occurrence in chromatin-positive and in chromatin-negative individuals (more frequently in the former) suggests that this disorder is not a homogeneous one. An XXY sex karyotype appears to be the most common although a variety of mosaics have been found. As a cause of Klinefelter's syndrome, abnormal sex-chromosome constitutions probably originate primarily by meiotic non-disjunction of an X chromosome occurring during gametogenesis in either parent. Recent studies indicate a relatively advanced maternal age at the time of conception, although the correlation is not as distinct as it is in mongolism. The fact that a Y chromosome is present in the sex karyotype of all patients with this disorder studied so far suggests that its male-determining properties are sufficiently strong to overcome the female determiners of two or more X's.

Turner's Syndrome, Individuals with this type of anomaly are phenotypic females with normal but underdeveloped female genitalia and absence of secondary sexual characteristics in or at puberty. In addition, they have an increased urinary excretion of gonadotropins and usually exhibit one or more associated congenital abnormalities which characteristically consist of shortness of stature, webbing of the neck, broad shield-like chest and cubitus valgus among others. The gonads usually are represented by vestigal fibrous streaks and the gonadal defect itself is but one of the particular constellation of congenital anomalies that is designated Turner's syndrome. Approximately 80% of the patients are chromatinnegative, referring to the nuclei which lack the normally-expected female sex-chromatin mass of Barr. But Turner's, as in Klinefelter's syndrome appears to be a heterogeneous one, bespeaking a variability in pathogenetic mechanisms.

Mongolism. The majority of mongols appear to be due to triplication of chromosomal material of number 21 autosome, with a modal number of 47, some with 46. Apparently this is due to the production of a gamete and ultimately a zygote with one more than the expected number of chromosomes. The effect of higher maternal age favors the impression that the defect develops during oogenesis and not spermatogenesis. The finding of a normal karyotype in both parents clearly places the errors at or after the parental gametogenesis.

Finally, in the majority of instances, there is no close correlation between karyotypes and disease patterns. Still, a current normal-appearing chromosome constitution does not exclude the possibility that chromosomal aberrations may exist and that fu-



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ture refinements in technic may make them manifest. For amplification of the above presentation with thorough documentation and references, the reader is respectfully directed to the original reviews of this subject by Dr. Arthur R. Sohval in the September 1961 issues, volume 31, pages 397 ff. of the American Journal of Medicine, and in an article "Chromosomes and Sex Chromatin in Normal and Anomalous Sexual Development," appearing in the Physiological Reviews, volume 43, No. 2, April, 1963, pages 306 ff.; from the former review, this article has been liberally excerpted. Additions in further definitions of terms have been appended from glossaries, appearing in these books: "Genetics for the Clinician," by C. A. Clarke, second edition (1964) Blackwell Sci. Publ., Oxford, pages 354 ff.; and "Medical Genetics," translated from the works of Widukind Lenz, Univ. Chgo, Press, (1963) pages 189 ff.

List of congenital abnormalities and hereditary conditions (exclusive of mongolism and sexual anomalies) showing an apparently normal karytotype (from compilations by Ford; and Harnden, Jacobs, and Buckton)

Achondroplasia

Acrocephalosyndactyly (Apert's disease)

Albright's syndrome

Amaurotic idiocy

Amyotonia

Anencephaly

Arachnodactyly (Marfan's syndrome)

* Abnormal satellites have been found in familial cases

Arthrogryphosis

Chondrodystrophy

Conjoined twins

Crouzon's disease (dysostosis cranio-

facilais)

Cyclops deformity

Dwarfism

Primordial

Hypopituitary

Ehlers—Danlos syndrome

Epiloia

New Diet 'Starves' Cancer Cells

A new diet which helps control cancer by "starving" cancer cells has been reported by Dr. Albert B. Lorincz, Professor of Obstetrics and Gynecology at The University of Chicago.

Twenty cancer patients using the diet for more than three months have shown "objective remission" of the disease and have been "relatively free of disability" while on the diet, Dr. Lorincz reported. He spoke at a Multidiscipline Research Forum held by the American Medical Association during its annual convention in Atlantic City.

The patients were terminal cancer patients who could not be helped by other treatment, such as surgery, chemotherapy or irradiation. Eleven of the 20 eventually succumbed to the disease in spite of improvements in their condition brought about by the diet.

Ten other terminal patients undertook the diet, but did not survive beyond five weeks. The course of their illness was probably not influenced by the diet because they were unable to retain sufficient amounts of any food to maintain adequate nutrition, Dr. Lorincz said.

Effective Palliative Regimen

"The diet is not a cure for cancer, but

is an effective palliative regimen which is intended to provide an opportunity to institute therapies not previously possible with these patients," Dr. Lorincz said. "A number of the patients have improved sufficiently so that chemotherapy and irradiation could be begun."

Dr. Lorincz emphasized that his work is still in the experimental stage, and said he hopes that his report will stimuate other investigators to carry out research with similar diets to explore their usefulness in the control of cancer.

The new diet contains a strictly limited amount of an essential nutritional factor, phenylalanine. It consists of a specially prepared protein material supplemented by foods containing only small amounts of phenylalanine.

The diet "starves" the cancer cells by depriving them of sufficient amounts of phenylalanine. For reasons not yet known, the cancer cells appear to be less able than normal cells to adjust to the limited amount of phenylalanine provided by the diet.

Use of the diet with individual patients is "complex and difficult," Dr. Lorincz said. Since phenylalanine is an essential amino acid which normal cells of the body

must have to remain healthy, the amount in the diet must be carefully regulated for each patient.

No Signs of Malnutrition

With careful management, patients on the diet did not show signs of malnutrition or anemia. Weight loss was moderate, and normal levels of hemoglobin and other blood proteins were maintained. The surviving patients have been on the diet for as long as 20 months.

The patients had a number of types of cancer affecting various parts of the body. Studies are under way to determine which types are most susceptible to the diet, Dr. Lorincz said.

Before using the new diet with cancer patients, Dr. Lorincz tested it extensively in a variety of laboratory animals. In these studies he found that the diet inhibited the growth of several types of tumors without causing excessive weight loss in the animals.

Other researchers have carried out cancer-inhibition studies on research animals using diets in which various essential amino acids were completely missing. Although some of the animals in these experiments showed an inhibition of tumor growth, they also suffered a significant loss of body weight and severe anemia.

In Dr. Lorincz's experiments, enough phenylalanine is provided in the diet to maintain the normal cells of the body in a healthy state. Dr. Lorincz believes that this is an essential requirement of the diet therapy because "only healthy tissue may have the ability to successfully compete with the tumor for the amino acid in short supply."

In his report, Dr. Lorincz cited a number of possible advantages which dietary limitation may have over other forms of cancer therapy:

1. Processes which may reduce the effectiveness of chemotherapy would not affect the limited diet treatment. Chemotherapeutic agents, for example, may be modified by the body so that they are non-toxic to cancer cells, or the cancer cells may be able to adapt to the presence of these agents.

2. The restriction of an essential amino acid in the diet is not accompanied by toxic or debilitating side effects, as are radiation and some carcinostatic drugs.

3. Any undesirable nutritional effects

can generally be readily overcome by reintroduction of a normal diet.

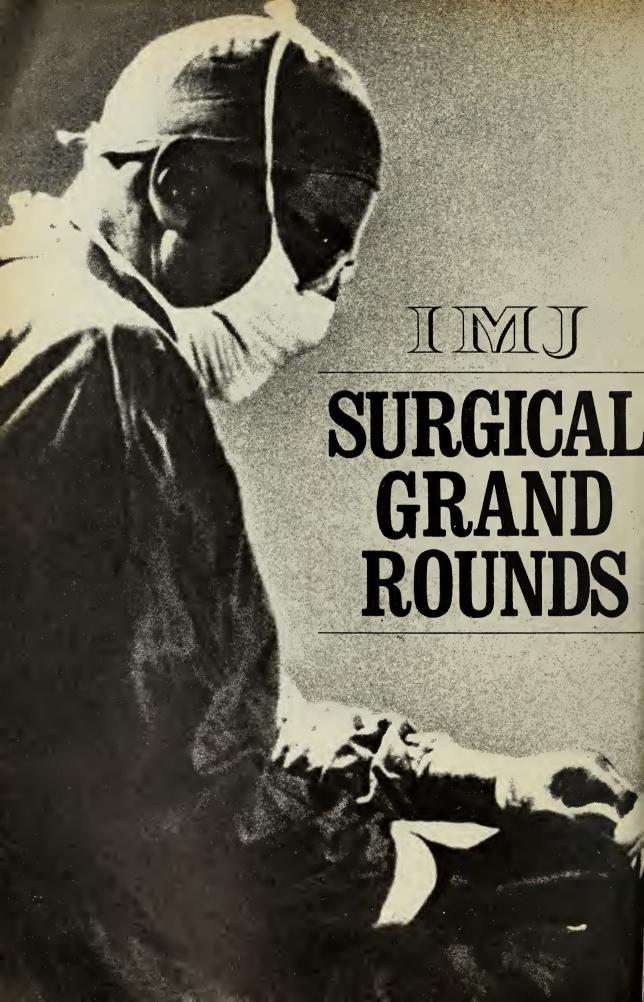
Dr. Lorincz's report at the AMA convention is the first full report he has given on the experiments with this number of cancer patients. Preliminary reports on the results achieved with fewer patients have been presented earlier.

Co-author of the report is Robert E. Kuttner, Research Associate in the Department of Obstetrics and Gynecology at the University.

Dr. Lorincz, a native of Chicago, received the B.S. degree in 1944 and the M.D. in 1946 from The University of Chicago. After serving an internship at the Illinois Central Hospital and residencies at the Chicago Lying-in Hospital of The University of Chicago, he spent 11 years of commissioned service in the Medical Corps of the United States Army. During this time he was Chief of Obstetrics and Gynecology at a number of U.S. military hospitals. From 1958 to 1961 he was an Assistant Professor of Obstetrics and Gynecology at The University of Chicago, and from 1961 to 1966 he was Professor and Chairman of the Department of Obstetrics and Gynecology at Creighton University School of Medicine (Omaha). In 1966 he returned to The University of Chicago as Professor of Obstetrics and Gynecology.

Kuttner is a native of Queens, New York. He received the B.S. degree from the City College of New York in 1950 and the Ph.D. in biochemistry from the University of Connecticut in 1959. After serving as a research associate in biochemistry at a mental hospital in Hartford, Connecticut, he joined the staff of Creighton University School of Medicine in 1961 as an Instructor in Biochemistry. In 1964 he became a research biochemist in the Department of Obstetrics and Gynecology at Creighton University School of Medicine, and in 1966 he assumed his present post at The University of Chicago.

Outdoor advertising will be available for the fifth annual observance of Community Health Week, to be marked Oct. 15-21. A single, 24-sheet poster emphasizing the broad Community Health Week theme, "Teaming Up for Better Health," is being developed by the American Medical Association.



Panel Discussion on Transplantation

Edited by John M. Beal, M.D.

Surgical Grand Rounds are held weekly at 8 a.m.; alternating between The Staff Room, Chicago Wesley Memorial Hospital and Offield Auditorium, Passavant Memorial Hospital. Patient presentations from these hospitals and from the Veterans Administration Research Hospital form the basis of the discussions. This case report was part of Surgical Grand Rounds on Jan. 21, 1967.

Dr. John Bergan: The program this morning is designed to present in an informal way some of the philosophy of the Renal Transplantation Team of the Northwestern University Medical School. Also, we shall relate our own experiences to those reported world-wide. Dr. Conn will open the presentation.

Dr. Julius Conn, Jr.: This 42-year-old dentist was noted to have casts in his urine and albuminuria while in the army in 1943. He was admitted to various Army hospitals where a diagnosis of chronic glomerulonephritis was made. In retrospect he remembers having numerous episodes of streptococcal throat infections as a child. From 1943 until 1965 his renal function progressively deteriorated.

In March of 1965 he was admitted to Passavant Memorial Hospital because of markedly impaired renal function. His BUN was 120, creatinine, 12. He underwent one hemodialysis. He was then instructed regarding protein, salt and fluid restriction. Two months later further diminution of renal function necessitated institution of chronic hemodialysis on a twice weekly basis, using an external Scribner shunt. After one year the shunt developed an infection and bleeding and was moved from one arm to the other.

Progressive Hypertension

In the Fall of 1966 progressive hypertension developed despite twice weekly hemodialysis and fairly stable blood chemistries. Coincident with the increasing hypertension

he developed advancing retinopathy with marked loss of vision. At this time he had already undergone 101 dialyses. It was decided that it was imperative that he undergo transplantation.

He was admitted to the hospital on Nov. 5 when a cadaver homograft became available. Prior to transplantation his blood pressure was 200/112; he had marked bilateral papilledema with bilateral hemorrhages and exudates. Peripheral edema was present. His hematocrit was 20 per cent.

Soon after his admission he underwent routine transplantation to the left iliac fossa. The ischemia time for the graft from the time of death of the patient until the kidney had been cold perfused was 30 minutes. Ischemia from time of death until reinstitution of blood supply to the graft totaled 142 minutes.

He was given Immuran immediately preoperatively and was continued on this postoperatively. In addition he was started on corticosteroid therapy. Postoperatively his urine output was in the range of 200-300 cc. per day. This was equal to the daily average from his own two kidneys which had not been removed at the time of transplantation. On the 10th postoperative day fever was noted and on the 13th postoperative day a superficial wound infection was drained widely. On the 14th postoperative day the urine output increased to 400 cc. Increasingly large amounts of urine were excreted until the 21st postoperative day when his output was 100 cc. per hour. As the function improved, the serum creatinine fell from 14 to 1.3 and the BUN dropped to 30. His blood pressure began to return to normal, antihypertensive drugs were stopped and the blood pressure remained 160/80.

Four Hemodialyses

During the immediate postoperative period, he underwent four hemodialyses to maintain him in the best possible condition until such time as the graft functioned. Three weeks postoperatively the shunt was

removed from his arm, his wound was healing and he was discharged from the hospital. At this time he was receiving Immuran, 150 mg/day and Prednisone, 40 mg/day. His weight had decreased 8 kilograms and he was on no fluid or protein restrictions. Approximately six weeks postoperatively he developed the first signs of rejection. This was manifested by a rising blood pressure and a decreasing renal function. The creatinine rose from 1.3 to 2 and his creatinine clearance dropped from 71 to 50 ml/min. This rejection crisis was treated with the intravenous administration of actinomycin C for approximately 5 days, plus increasing the dose of Prednisone to 60 mg/day. The renal function again returned to normal. His most recent chemistries showed creatinine of 1.2 and creatinine clearance of 79 ml/min. His wound is now healed. His blood pressure has remained elevated and he has had to be replaced on antihypertensive drugs and is now being considered for bilateral nephrectomy.

Patient Enters

Dr. Conn: Good morning, can you tell us something of your sensations as the kidney began to function?

Patient: Well, when I was on dialysis initially, I felt quite well. However, after the second year I had nausea, headaches and general malaise. However, after my transplant I felt a lot better. In fact, I feel really good right now.

Dr. Conn: How do your sleeping habits compare to those prior to transplantation?

Patient: As dialysis proceeded into the second year it was almost impossible for me to get an hour's sleep at a time. And after my transplant I was able to sleep 6-7 hours at a time without the use of drugs.

Dr. Conn: During the episode of rejection we increased the cortisone to 60 mg/day. It will be tapered off again later. Thank you very much for coming this morning.

Patient Leaves

The candidate for admission for chronic hemodialysis and for transplantation is a patient with irreversible renal failure, who is under the age of 45, has no systemic disease such as lupus erythematosus, has little uremic neuropathy or retinopathy. He should be free of active infection and the lower urinary tract must be unobstructed at the time of transplantation.

Preoperatively the patient undergoes psychological testing. He must be cooperative and potentially rehabilitatable. In the early phases, patients are controlled with dietary restriction of protein, salt and fluid as they undergo intermittent dialyses. They may be hemodialysis or peritoneal dialysis. Complications occur during peritoneal dialysis which make this technique inapplicable for long-term use.

As the patient's disease progresses, a Scribner shunt is placed in an accessible artery and vein in the arm and the patient comes in weekly or bi-weekly for hemodialysis. Complications of this shunt include local or generalized infection with necrosis of the arterial wall and bleeding. Interestingly, one of the more serious complications is the fact that the patient is wearing an apparatus on his arm, and is constantly reminded of the fact that he is dependent upon it for life.

Subcutaneous Shunt

We have become interested in a method of eliminating the use of the external shunt and now have patients with a subcutaneous shunt fashioned by producing an arteriovenous fistula between the distal radial artery and the adjacent vein. By arterializing the venous system, we are able to dialyze the patient with flow rates in the range of 200 to 300 cc/minute by the placement of the two large bore needles into the venous system of the forearm. With this type of shunt the patient has no bandages, no external apparatus and is able to live a more normal existence.

In situations of advancing preoperative hypertension, if the patient becomes totally unresponsive to medical therapy, a bilateral nephrectomy prior to transplantation can be done. Following this patients become easily managed as far as their blood pressure is concerned.

Once the cadaver graft becomes available, the patient is given a dose of Immuran and during the actual operation steroids are given. Postoperatively, reverse isolation is used for a week until response to the immunosuppressives can be measured. In order to prevent bacterial, viral and fungal sepsis, all foreign bodies are removed as quickly as possible. This includes catheters from the bladder, drains and any other apparatus that has been placed. No antibiotics are used postoperatively until the specific indi-

cation arises. Patients are dialyzed on the same schedule as before surgery. Function of the cadaver graft may be delayed or it may begin to function immediately.

The problem of rejection in the cadaver graft is difficult at best. There are many signs of rejection. Although most will occur at one time or another, there is no reliable combination of signs and symptoms which appear in the graft which is not functioning. Some of the things that we look for are increasing size of the graft, tenderness, enzyme changes in the urine and blood, the appearance of white cells or lymphocytes in the urine, rising blood pressure and fever. So many of these are signs that are found in any patient following surgery that it can be very difficult to determine rejection when the graft is not functioning.

In this patient, the creatinine began to rise as did his peripheral blood pressure. Once this occurred, therapy consisted of elevating the steroid dose. If this is sufficient to reverse the rejection then this is all that is done. If not, the next step is the institution of actinomycin C therapy. Local irradiation to the kidney can also be added.

Fairly Normal Life

This patient, as he indicated, has been returned to a fairly normal life. In talking to him yesterday he is in the process of returning to active practice of dentistry.

Dr. Bergan: Dr. Conn has covered the problems inherent in the preoperative and postoperative management. Dr. Kenneth Kropp will speak to the point of obtaining kidneys and some of the technical aspects.

Dr. Kenneth Kropp: This patient states that prior to his transplant operation his urine looked like water, but one of the "joys of life" since his operation has been to pass urine that looks and smells like the real thing.

There are a number of problems that physicians performing organ transplantations face but three of the more important are: 1) Accurate diagnosis of rejection; 2) Development of specificity in immunosuppressive therapy; and 3) Procurement and storage of organs for transplantation. The reason that renal transplantation is ahead of the transplantation of other organs is because kidneys are paired structures. This has allowed removal of a kidney from a donor without injury to the donor. There are, however, approximately 60-90,000 peo-

ple dying of renal disease each year who could be salvaged by a kidney transplantation, but, of course, there are not enough live donors available to supply this need. It becomes obvious that a system has to be developed for procuring viable organs from recently deceased people to meet this demand. One of the purposes of this presentation is to review with you the methods used in cadaver organ procurement.

Need 3 Operating Rooms

All dying persons would obviously not be good candidates. Rather than tell you which type of dying patient is not a candidate, I will say that young patients with head injuries, intracranial neoplasms, or undergoing cardiovascular surgery are the most ideal. Once we are notified that a good candidate is about to die we alert the operating room personnel to set up three rooms. When the managing medical or surgical service has determined death of the patient they obtain permission from the nearest of kin to remove the kidneys for transplantation. Intracardiac heparin is given and external cardiac massage instituted for 60 seconds. The cadaver is then taken to the operating room and the kidneys removed using aseptic technique. The kidneys are perfused with a cold heparinized solution of lactated ringer and placed in sterile slush to await the implantation operation. We attempt to keep the warm ischemia time (time of death to cold perfusion) under 60 minutes and definitely under 90 minutes. The cold ischemia time (from perfusion to reimplantation) is less critical and is usually 60 to 120 minutes. Two recipients are being prepared in adjacent operating rooms each to receive one of the kidneys. It is obvious that the mobilization of two anesthesiologists, 6-8 surgical nurses and about 10-15 physicians in less than thirty minutes is a feat that demands cooperation. We have a number of people right now who are being dialyzed twice weekly who have no available relative donor. These patients depend on our ability to find a suitable cadaver donor and this in turn depends upon the attending staff being aware of our needs. I want to thank you for the cooperation we have received thus far from the attending staff and hope that this conference today reinforces the magnitude of our needs.

Dr. Bergan: Professor Michael Woodruff

called attention to the fact that there would be three basic problems in transplantation: The immunological problem which has not yet been solved; the technical problems which have very much come under control: and the problem which Dr. Kropp has raised, the social problem, the change in attitudes which the medical and non-medical community must undergo. Dr. John Grayhack will refer to social attitudes and some of the moral problems involved.

Dr. John Grayhack: You are all aware of the difficulty involved in being asked to perform a procedure on a healthy person who is not likely to benefit by it, and this has been a real problem with us. I refer to the removal of kidneys from a volunteer donor. What about the medical wisdom of using a healthy volunteer? If you really are any sort of a mathematician I am sure that you could figure it out. The persons that donate a kidney are less than 45 years of age usually; if one of these patients dies, we lose about 30 healthy patient years. It is going to take a lot of transplants who are healthy to make up for the loss of this one donor. Although there have been no deaths, there have already been close calls. The use of the cadaver kidney is really the only reasonable approach in my opinion. The two problems are recognition of the death of the kidney and tissue typing. I think that with a little more study we will be able to recognize when a kidney is no longer of potential value. The only other reason for using a related donor now is that by chance there is less chance of rejection. I think as typing becomes a reality that this objection will also go by the wayside.

Dr. Bergan: My purpose is briefly to summarize our own results here at Northwestern and compare them with the world experience that has been partially reported to us. The total world transplant experience now includes 1,064 grafts. These are divided into two arbitrary reporting periods. The first covers time up to March, 1965, when the International Transplant Registry made its first report. We contributed 8 patients to this first summation. Of the 672 grafts at that time, only 10% were cadaver grafts. At the present time the change in attitude reflected in medical science has allowed the use of more and more cadaver organs. Now 40% of the transplants being done throughout the world are cadaver grafts. This has been reflected in our own attitudes here where we are now using only cadaver kidneys.

Since March, 1965, there have been 370 transplants and we have done 11 in the same period of time. In the first reporting period 40 patients had had removal of a kidney transplant and implantation of a second one. Similarly we have in our current repository of patients waiting for kidneys, one who has had removal of a non functioning graft and awaits a second transplantation.

Parallels World Experience

Our experience parallels the world experience. We have used 7 of 17 living related donors. Six of the seven in this group have been mothers, one was a sibling. In living volunteer donors we do not use convicts nor do we advertise in the newspapers. We have had four living donors who have not been volunteers. These were therapeutic nephrectomies. In the use of cadavers, we are about even with the rest of the world. About 35% of our transplants have been cadaver kidneys. However, our results are poorer than the world and this reflects our inexperience. In living related donors we have had difficulty with antigenic mismatches. Only 3 of our seven patients with living related donors have survived more than one year, the oldest has gone 2 years and 9 months. Two of ours succumbed after a year, one to fungus infection and the other to viral infection. This indicates that the immune suppressive therapy was lethal. In living non-related donors we should have expected to have a 65% one year survival. We have only had one of our "free" kidneys last more than one year. In the use of cadavers three of our six failed to function entirely, two are currently functioning. The groups having the largest experience now expect a 60% one year function and very small attrition rate in the second year in these grafts.

In summary, we stand on the threshold of a great surgical era. Already cadaver organs have been transplanted from the dead to the living. In the living, new health, new life, has allowed conception and birth of a normal child. This aspect of immortality causes us all to re-examine our traditional concepts of life and death. It may be that mankind will eventually be unable to afford the luxury of discard of dead, but viable organs.

Chronic Disability and The Sick Role

By H. H. GARNER, M.D./CHICAGO

In his paper on Narcissism, Freud¹ wrote, "The sick man withdraws his interest and libido from the outer world and sends it forth again when he recovers." He went on to quote W. Busch, who wrote of the poet suffering from toothache, "Concentrated is his soul in his jaw-tooth's aching hole." What Freud wrote is certainly applicable to the problem of the patient with acute illness or severe pain. The patient suffering from less acute problems also withdraws his interest from the outer world but in a less dramatic manner and with an unconscious and conscious effort to do more than seek relief from the pain of the moment. A better understanding of the sociological significance of illness as an established and accepted social pattern is necessitated by our changing medical responsibilities to society.

The Sick Role: Physicians have been aware of the "sick role," as an important avenue of living for many citizens in our society. They were most familiar with this problem when hysterical phenomena, hypochondriasis, or undue dependency were noted by the physician. In physical rehabilitation programs, one attempts to use techniques to promote healing, develop unused potential in injured tissue and to substitute functions available through normal tissue for that function lost in diseased organs. There is also an explicit or implied recognition that a desire existed on the part of many patients to remain sick and that the rehabilitation techniques would act to persuade the patient that gratification in being healthy could outweigh the gratifications in being sick. We all know that being sick has greater meaning than the existence of organic pathology. Often, the individual with organic pathology does not assume the sick role, whereas others with little pathology may readily assume the role.2

Patient Exempt from Responsibilities

Parsons,3.5 a sociologist, indicated that

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sickness constituted a role in society for which there was a set of institutionalized exemptions and expectations. The institutionalized aspects of the sick role were described by him as exempting the patient from his responsibilities and from participating in activities; he is also exempted from any blame for acting sick since he is considered sick and as not being accountable for his inability to fulfill his responsibilities. Society, however, expects that he try to recover and he is further expected to seek help in getting well. Burstein,6 described the incongruent possibility that the patient may find himself obligated to stay sick. Rather than fulfill the expectation of recovery, the patient may find that society in the form of the social institution of the hospital, nursing and medical personnel and even fellow patients may make the sick role obligatory. Often, family stability is accomplished through the patient's maintenance of the sick role. A conflict may then be produced in which the patient finds himself receiving conflicting messages as described in the double-bind concept of Bateson,7 For instance, the physician encourages him to recover, whereas, the spouse encourages him to remain sick. The problem of malingering has also plagued the physician. Recently, the author⁸ indicated that the frequency with which malingering, the conscious effort to defraud through illness, was not significant statistically as against the frequency in which the sick role was an expression of unconscious determinants. However, the expressed danger of a breakdown in our institutionalized concepts of rights, moral obligations, the virtues of truth, hard work, and honesty is associated with concomitant increased value for the sick role. Personal injury compensation, health insurance, social security disability, and other well-established patterns for making the sick role a desirable one are finding greater acceptance. The appearance of the above mentioned social protections for the person who is sick makes malingering and the use of the sick role as a means of defrauding an ever increasing tendency. Varying admixtures of conscious and unconscious motives will be discernible in the patient depending upon his moral and ethical code.

Interpersonal Relationships Disturbed

It has been a constant observation in several years of interviewing patients, admitted routinely for diagnostic consideration and evaluation, that most of them show considedable evidence of disturbances in interpersonal relationships. It is such disturbances which are responsible for all or most of the symptoms which bring many of the patients to the clinic. A patient may be seen because of any one or many pathological conditions but, unless the somatic disease is associated with considerable disturbance in physiology (of which the patient is consciously aware) even a relatively superficial probing of interpersonal relationships will demonstrate that many of the patient's symptoms are a breakdown in psychological homeostasis provoked and maintained by frustrations in the environment. One is also impressed by the acute withdrawal from objects and the narcissistic preoccupation with any lesion which produces acute physiological changes which are threatening to the individual. This withdrawal of interests from object to self is a very valuable differential diagnostic factor in the determination of structural change. It can be said almost categorically that a marked investment of interest in certain structural and physiological changes with little adaptive potential being available for an awareness of present, past, and future interpersonal involvements would be indicative of an acute illness, a severe chronic disabling disease of the fantasied threat of a severely disabling or fatal illness.

Treating Chronic Illnesses

The following concepts are generally accepted as being fundamental to the problem of treating chronic and disabling illnesses:

When organs are damaged anatomically and permanently, restoration of function and rehabilitation are brought about through working with that which is not impaired.

A state of relative well-being with a minimal subjective awareness of the symptoms, and minimal loss of function is the desired medical goal.

Prolongation of illness and chronic

invalidism are often the result of psychological factors. Creating a motivational press toward establishing a role of constructive and creative adaptability to life must outweigh the encouragement of the sick role in the treatment process.

Patients with serious disability to whom our discussion particularly pertains may fall into the following groups:

- (1) Traumatic disabling diseases
 - a. Skull fractures and head injuries
 - b. Fractures and other bony and ligamentous injuries
 - c. Paraplegia and quadraplegia
 - d. Amputations
 - e. Chest and abdominal injuries
- (2) Chronic diseases involving the neuromuscular osseous system or internal organs
 - a. Chronic arthritis
 - b. Multiple Sclerosis and other neurologic diseases
 - c. Tumors and Endocrine Diseases
 - d. Myopathies
 - e. Chronic Blood Diseases
- (3) Chronic infectious diseases
- (4) Chronic psychiatric disabilities
- (5) General debilitating disorders, characterized by aging and arteriosclerosis

Factors Influencing Rehabilitation

There are many factors which decrease the potential for rehabilitation of patients suffering from chronic disabilities. In patients with serious disability whose recovery often does not seem to be as rapid and as complete as expected by the limitation of the disability, the reason might be associated with psychic conflict. Tests designed to bring out significant personality deviations have shown a greater degree of severe personality disorder in the patient whose recovery is delayed. As indicated, the clinical observations at an outpatient admitting clinic reveal the frequency of psychologically ill persons. Nevertheless, the management of the patient is usually based on the medical model for treating physical illness. The patient invariably wanders from one specialty to another in a quest of the healing oracle for the abdominal pain, chest pain, headache or other symptom, which, at the moment, is the center of attention. In many patients with severe disability, the disabling psychological overlay must be treated before the patient can go on to full

utilization of those functions of which he is capable.

The psychological overlay is a result of many influences such as the following:

The implication of an acute loss is different than that of an insidious loss. The immediate fear and anxiety is soon alleviated by early signs of recovery. The narcissistic value of the organ may be a crucial factor.

The meaning of mastery of the environment for the person may be most important. When mastery is particularly frustrating, the danger of psychological overlay is increased, and the need to justify one's disability is greater.

The importance of one's family—its view of the sick role—cannot be overstated. The suggestions about the illness, made by individuals in a position of authority—parents, friends, doctors, and social—all may contribute to further disability.

Conformity and maintenance of rigid standards may limit expression of affect, cause further repression and delay insight into psychological factors in the illness. The patient's management of frustrating situations through adequate emotional expression is not possible in the presence of a rigidly structured personality.

It's less possible to gain prestige through achievement. Illness to avoid injury to one's prestige values may be utilized to its fullest possible extent as described under the term of secondary gain.

Physical factors which add to the frustration in attempting to remaster the control over environment may be important, i. e. overweight, asthenic muscular development, multiple defects (previous physical incapacity, etc.) and disfigurement.

Economic and social status: Repeated illnesses and chronic disability are more likely to occur among those who are less fortunate economically and intellectually. Preventive medicine and surgery is more readily available to those in higher income levels.

Psychological reactions not related to the physical disease may be interpreted as a part of the disease and prolong the disability, i.e., the physiological expressions of anxiety.

Physical disability tends to decrease the person's desire for interpersonal contacts. The danger to patient's sense of pride and shame due to disfiguring disabilities, diffi-

culty in managing food, impotence, etc., and similar handicaps are significant.

In addition to the symbolic meaning of the organ or organs affected there are secondary gains in being ill, e.g., lack of odious tasks, increased attention from family and friends.

Either overemphasis on the physical treatment of indifference to the psychological needs of the patient may unduly prolong illness and contribute to iatrogenic noxious effects.

Self-Destructive Tendencies

Recovery may be delayed by self-destructive tendencies. Studies of patients with tuberculosis have offered many insights into the problems of rehabilitation of the chronically ill and the person with prolonged disability. They center around these basic generalities. Does the dependent situation serve a need for the patient and produce gratification, or does it serve to cause anxiety? How does the new situation affect the patient? Are previous situational conflicts solved? Are new situational conflicts produced? What psychological disturbances are activated, or reactivated by the fact that the person has a disease which might be contracted by or offend others? How is this patient to be restored to the community, rehabilitated to face life with personal satisfaction and as a member of the society which he left prior to his illness?

Somatopsychic Syndromes

The symptom syndrome in those conditions in which the somatic disability is obvious includes a complex of symptomatology based on the patient's previous personality, the time, place and circumstances surrounding his physical disorder, among other factors. One could describe such syndromes as somatopsychic syndromes. The reactions of the patient to the awareness of his illness include attitudes which Parson described as the expectations of the sick role. The major symptoms and attitudes include the following:

- (1) Increased absorption with the self, self-love (narcissistic withdrawal of object libido).
 - (a) Withdrawal from important person in one's milieu.
 - (b) Withdrawal of a more general nature into a circumscribed world e.g., patients in institutions

may is olate themselves completely.

- (2) Hypochondrical symptoms tend to overlay those due to the disability caused in the organ. (This has been expressed as investment of the injured part with libido withdrawn from objects.)
- (3) Increased phantasy life, expressive reactions, (crying, etc.) and loquacity are means of expressing the activity being blocked from external expression.
- (4) Increased dependency desires and need for affection (primarily of infantile needs) are mobilized. There is recognition of the illness's value in permitting capitalization on the problems and conflicts of a psychosocial nature-secondary gain.

(5) Over-evaluation of authority, the doctor, nurses, etc., results from dependent and infantile cravings.

- (6) Aggressivity, irritability and bitterness may be expressions of a realistic distrust of the motives of others in helping the patient, but more frequently are reactions to finding that the dependent, infantile strivings for protection and affection are not fulfilled in keeping with the patient's wishes and expectations.
- (7) Feelings and shame, masochistic acceptance of pain and passive resignation to illness may all serve the adaptive needs of the individual in dealing with unacceptable impulses of a sexual or aggressive nature.
- (8) Denial of illness and sacrifice of one part for another are also seen as methods of maintaining self-esteem and dealing with threats of loss of mastery of environment. Weinstein and Kahn⁹ stress the significance of the premorbid personality in determining this defense.
- (9) Confabulation is another means of establishing a relatedness to environment. Denial and confabulation may, especially in the brain-injured person, be accompanied by disorientation for time and place.
- (10) Faith in one's invulnerability is a prime factor in determining reaction to the shattering blows of illness. (Masserman)¹⁰

Psychoneurotic influences may reward the

patient not only for becoming ill, but for remaining ill. (Kubie)¹¹ Masked rewards for retaining specific symptoms may be found in the treatment supposedly carried out for their removal (Giffin et al).¹² The treatment situation may offer compensations for continued dependency and for regression to an infantile state of total helplessness. It may offer such compensations through the unconscious fantasies of being loved and sexually gratified, among others.

The nature of the treatment and what will result there-from is relevant to the considerations which are most important for the patient. I am of course putting aside as unnecessary for elaborated discussion the fact that all the specific and helpful remedies which can cure or alleviate pain, correct or improve a defect, or offer symptomatic improvement will be used for the patient's benefit. The patient obviously will be given necessary medications, manipulations, and surgical interventions. To these he will have a greater or limited response potential.

Recommended Therapy

The following recommendations have been recognized as the essentials of therapy for the disabilities due to chronic disease: Prepare the patient psychologically for his hospitalization by proper orientation as to the meaning of hospitalization. After hospitalization occurs, the goals uppermost in the care of the patient include control or elimination of the disease where possible and the avoidance of such psychological trauma as may be associated with a lessening of the patient's desire for recovery and such influences which increase anxiety about the illness. Understand the personality of the patient and what the situation of illness means to him. The inner requirements of the patient may call for a careful analysis of their significance during the illness, how they help the patient, and how they may be used to encourage him to continued improvement. Treatment so structured that the patient will be directed toward a goal of rehabilitation. Special emphasis must be placed on the avoidance of encouraging very dependent attitudes through creation of an atmosphere therapy which encourages security through the sick role. Prepare the patient for return to the community through interpreting the problems of medical, social, and economic readjustment and indicate what help may be expected, if needed.

Doctor-Patient Relationship

A description of the basic doctor-patient relationship in terms of patient attitudes toward the doctor's interventions is the orientation suggested by the author.13 Compliance, compliance with critical appraisal, non-compliance, and critical appraisal are terms used to describe this orientation. Sickness and the value of the sick role in our society tend to foster a complaint attitude toward the physician and the institutions which encourage an obligation to be sick. There is a danger that the patient may see his role as being obligated to improve enough so that he gratifies the physician's needs to have his patients say that they are improving yet remain sick enough so that they do not lose the doctor. This is especially true for the chronically disabled who can, thereby, be assured of the interest of the person expected to help him and assured of not losing him by not recovering too completely. In essence, the patient complies with what he feels is an obligation to remain sick. The patient may be placed in the double bind referred to earlier: he receives messages from two sources, each of which awaken conflicting complaint tendencies in the patient. One is apt to see this in a family in which a spouse may have many fears of the effects of the patient's return home or of the increased demands of the patient on the family. The vicarious gratifications of wife or husband, mother or father received through the sick role of the patient, may be transmitted to the sick individual. The patient is obligated to remain sick at the threat of loss of love; however, there is an awareness of society's expectations that he should strive to recover. Another double bind is one in which the sick role is encouraged by the husband whom the spouse desires to please at the same time the physician is encouraging her to recover. However, the physician may fail to comprehend the husband's encouragement of the sick role and may inadvertently say and do things which encourage compliance with the desire of the spouse that sickness be retained.

Accepting of Sick Role

The person who is compliant only after critical appraisal of the circumstances of his illness and the physician's prescriptions may accept certain aspects of the sick role and comply because he sees that it is in his best interest. He may, for instance, feel that the physiotherapy he is receiving is not much better than exercise that he would carry out himself. Nevertheless, he accepts the treatment because he wants a particular physician to care for him and feels the doctor is easily incensed by patients who fail to carry out his orders. Such patients will not, as a rule, retain the sick role longer than is necessary for effective recovery.

Non-compliance with the sick-role expectations of society, family or physician is usually not a problem for the physician since the majority of individuals with resistance to acceptance of the expected sick role do not see the physician. Doubts and distrust, fear of dependency, the threat of being deprived, fear of being submissive, fear of homosexual feelings, the danger of being faced with a dreaded diagnosis and the threat to one's narcissism or masculinity are some of the underlying reasons for a non-compliant patient. If the suffering from disabilities or arthritic changes is such that disability or discomfort outweighs the noncompliant tendency of the sick person, he may accept the expectation of the sick role that he seek help and may then undertake to do what is necessary to improve. An awareness of non-compliance as an attitude of the patient should lead to a tempering of that behavior by the therapist which awakens feelings of a dominant-submissive relationship. He should encourage a feeling that guidance and cooperation, or mutual participation represent the operating relationship. The patient may then respond with acceptance of need for help from a person qualified to give it.

Non-Compliance With Appraisal

It might be appropriate to say a few words about non-compliance with critical appraisal. There are some instances of noncompliance where the critical faculties of the patient permit him to accurately evaluate intended interventions of the physician as acting against his best interest. He may see himself as being encouraged to assume the sick role to a degree and under circumstances that are not in his best interest and may demonstrate his understanding by a non-compliant attitude to the recommendation of the physician. Physicians responding to such attitudes with hostility feel a need to defend and justify their own position.

A doctor-patient relationship of mutual participation in which the patient sees himself as a mature human being capable of interchange with a person expert in the health profession is highly desirable whenever possible. The physician must then have the maturity to recognize his limitations and respect the patient as a person capable of reasoning and decision-making with the help of the facts supplied by the experts. The patient in this mutual-participation relationship is seen as responding to the treatment with critical appraisal. Usually the patient with arthritis or chronic disability is most comfortable when he sees the physician as an omnipotent, omniscient person willing to put the patient's interests above his own and capable of healing him and making him invulnerable. The sick individual may not find critical appraisal of his position in life and of the capability of his physician to help make him very comfortable. However, when the physician fails to use the problem-solving potential of the patient and depends solely on the need for faith and delusion, he will have failed to help the patient to the fullest extent possible.

Understanding of Sick Role

In summary, I wish to emphasize that there is an institutionalized sick role concept in our society. We must recognize its implications for understanding the patient with arthritic, orthopedic and other chronic disabilities. The doctor-patient relationship, as seen by the patient in his responses to the treatment efforts of the physician, will help determine how much improvement occurs in symptoms and in physical and social rehabilitations. The compliant, noncompliant, or critically appraising attitude toward the doctor-patient relationship must be assessed by the physician in the total management of his patient. Utilization of the patient's attitudes to the doctor-patient relationship to bring about restoration of health-to surrender the sick role-is a paramount treatment factor in effective management of the patient.

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Agent to Reduce Elevated Serum Lipids Announced

An effective agent for the reduction of elevated serum levels of cholesterol and triglycerides has just been made available by Ayerst Laboratories, of New York. The drug, ATROMID-S® (clofibrate), has been approved for prescription by physicians by the Food and Drug Administration. Many authorities have linked elevated serum lipid levels with coronary artery disease.

More than 3,000 patients have been

treated to date, some for periods of up to four years, and the response (reduction of cholesterol and triglyceride levels) has been very encouraging.

These clinical laboratory data have been obtained from patients with disorders of lipid metabolism with and without associated atherosclerotic heart disease, cerebrovascular disease, xanthomatosis, and diabetes mellitus.

A Case Report:

Persistent Pulmonary Infection with Phage-Associated Mucoid Pseudomonad

By Maurice W. K. Byrne, M.D., Alfred Linker, Ph.D., Theodore Yonan, B.S., Russell S. Jones, M.D., and Syd Husain, Ph.D.

Mucoid pseudomonads have been frequently isolated from the tracheobronchial secretions of patients with cystic fibrosis. 1, 2 Such micro-organisms have been observed infrequently in other infections. Linker and Jones found the mucoid property of the pseudomonad to be due to the polyuronide, O-acetyl alginic acid.^{3,4} Recently, lysogenic phage has been implicated as inducing the mucoid production by the pseudomonads.5 It has been proposed that the phage infection of the pseudomonad results in a mucoid organism more adapted to survival and to continued disease production in the favored milieu of bronchial secretions. The present report concerns an elderly woman with a long history of bronchial disease and intermittent bronchopneumonia from whose tracheobronchial secretions a pure culture of mucoid Pseudomonas aeruginosa has been recovered consistently and repeatedly over an 18-month period. The pseudomonad has retained the same cultural charactteristic in that each isolate was highly mucoid on primary plating on brain-heart infusion, blood and eosin methylene blue agar. In addition, the mucoid pseudomonad contained its own phage which has remained consistently lytic against strain 822 (19144 indicator strain)*. Electronmicrographs of the viscid bronchial secretions not only revealed the numerous mucoid

*American Type Culture, Second Supplement, 7th Ed.

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pseudomonads but an occasional formed phage as well.

Clinical Findings

The slender, white woman, then 41 years of age, was first seen by M.W.K.B. in 1930 for extensive cystic disease of the left breast and again in 1932 for similar disease in the right breast. In 1935 (46 years of age) clinical records indicate the onset of recurrent respiratory infections characterized by a nonproductive cough, wheezing and rales and occasionally by tachycardia and mild fever. Blood pressure averaged 142/80 and electrocardiograms were non-specific. Roentgenograms of the chest disclosed increased hilar markings. In September, 1960, pleural thickening of the left interlobar fissure was noted. During this period, the patient was involved in several automobile accidents and had an appendectomy. She was fatigued and under great emotional stress, caring for her bedfast husband. At this time, she also had osteoarthritis, especially in the cervical area, and Heberden's nodes developed in the fingers. Her red blood count ranged between 4.3 and 5.0 M, peripheral leukocyte and differential counts, as well as the urine, were normal. The patient was 61 inches in height and weighed 90 pounds.

A soft systolic apical murmur was detected in April, 1962, and roentgenograms of the chest in May, 1963, disclosed an infiltration in the lingula. At this time, the blood pressure was 142/74, electrocardiogram normal, RBC 4.85 M, WBC 5,350 with 62% segs, 38% lymphs. In January, 1964, examination during a comparatively asymptomatic phase revealed coarse rales throughout the chest and similar laboratory findings to the above. In March, 1964, the patient had the sudden onset of hemoptysis associated with coughing. Rales were present but there was no fever, leukocytosis or dyspnea. Roentgenograms showed an infiltration in the left upper lobe. The expectoration of blood streaked, abundant mucoid sputum con-

Table 1
ANTIBIOTIC SENSITIVITY OF MUCOID PSEUDOMONAD

Antibiotic	Bronchial Aspirate	Sputum	Sputum	Sputum
	June, 1965	Dec., 1965	April, 1966	Sept., 1966
Terramycin	Sensitive	Sensitive	Sensitive	Sensitive
Dihydrostreptomycin	not used	Sensitive	Sensitive	Sensitive
Colymycin	Sensitive	Sensitive	Sensitive	Sensitive
Kanamycin	Resistant	Sensitive	Sensitive	Sensitive
Tetracycline	Sensitive	Sensitive	Sensitive	Sensitive
Chloromycetin	Resistant	Sl. Sensitive	Resistant	Sl. Sensitive
Furadantin	Resistant	Resistant	Resistant	Resistant
Nalidixic Acid	not used	Resistant	Resistant	Resistant
Gantrisin	Sl. Sensitive	Sensitive	Resistant	Sensitive
Demethylchlortetra-				
cycline	not used	Sensitive	Sensitive	Sensitive

Table 2
DETECTION OF PHAGE IN MUCOID PSEUDOMONAD RECOVERED AT
DIFFERENT PERIODS

Pseudomonad*	Bronchial Aspirate	Sputum	Sputum	Sputum
Test Strains	June, 1965	Dec., 1965	April, 1966	Sept., 1966
113	neg.	neg.	neg.	neg.
130	neg.	neg.	neg.	neg.
138	neg.	neg.	neg.	neg.
417	neg.	neg.	$_{ m neg}$.	neg.
816	neg.	neg.	neg.	neg.
839	neg.	neg.	neg.	neg.
272	neg.	neg.	neg.	neg.
822	CL**	CL^{**}	CL**	CL**

^{*} Battery of non-mucoid pseudomonads found to be phage-free but susceptible to phages from other pseudomonads.

** Complete lysis.

tinued for five weeks. The roentgenograms showed a diminution of the infiltration in the right middle lobe. A large emphysematous bleb was also seen in the right middle lobe. At the end of this episode, the roentgenograms were interpreted as showing fibrosis and partial atelectasis of the left upper lobe and right middle lobe. Bronchoscopy, cytologic studies and acid fast cultures of the sputa were negative.

The episodic coughing continued for some months and dyspnea became more pronounced. Mucoid sputum was abundant but was not blood streaked. Blood pressure ranged from 100/70 to 90/60. Electrocardiogram disclosed nodal extrasystoles. The infiltration in the left lung remained unchanged. She was hospitalized with fever, coughing and dyspnea in May, 1965. Roentgenograms of the chest showed a consolidation in the right middle lobe which cleared after three weeks. Sputum and the bronchoscopic aspirate disclosed a pure culture of Pseudomonas aeruginosa. With continued

subculturing on agar plates, phage plaques appeared in the mucoid pseudomonad colonies. One week after discharge, the patient had recurrence of the coughing and copious bloody sputum and the phage-containing mucoid pseudomonad was again recovered from the sputum. The roentgenograms of the chest showed the same infiltration in the left lung but no new lesions. Cardiac irregularity due to auricular extrasystoles and blood pressure of 132/80 were noted on all office visits. Periods of non-febrile coughing with copious bloody sputa and chest rales continued. The mucoid pseudomonad was recovered November, 1965, January, April, May, July and September, 1966.

On July 26, 1966, the patient was again hospitalized for recurrent hemorrhage, cough and dyspnea. A lung scan with macroaggregated albumin ¹⁸¹I revealed several areas of decreased vascular flow throughout both lungs. Roentgenograms of the chest showed calcification of the aortic arch and changes suggestive of bronchiectasis. Hema-

tocrit was 39, hemoglobin 12.8 gms, RBC 4.36 M, WBC 6,050, segs 69, bands 7, eos 2, lymphs 22. The total protein was 6.7 gm; albumin 2.54 gm; and alpha 1 globulin, 0.26; alpha 2, 0.09; beta, 0.95; gamma, 2.04. Acid phosphatase was 1.5 and alkaline phosphatase 1.2. Sputum was negative for malignant cells, cytologically, and cultures continued to show the mucoid P. aeruginosa. Following approximately 21 days of hospitalization and extensive therapy with chloramphenicol, the patient was discharged with diminished respiratory symptoms and without hemoptysis. Ten days later, however, the patient again coughed up bloody mucopurulent sputum containing numerous mucoid pseudomonads. Symptoms subsided with the use of demethylchlortetracycline.

On November 23, 1966, severe respiratory distress and copious blood streaked sputum required hospitalization. The mucoid pseudomonads were abundant in the sputum. A killed suspension (vaccine) of these organisms, 109/ml in 0.15 m NaCl, was prepared with 0.05% phenol and 60°C. temperature

Fig. 1. Electronmicrograph of sputum containing numerous P. aeruginosa with prominent mucoid capsule. Cytoplasmic processes of leukocytes are present between the groups of pseudomonads. Stained with lead citrate x 6,500.

for one hour. The patient received eight daily subcutaneous injections of the sterile suspension beginning with and increasing at increments of 0.01 ml (10⁷ pseudomonads). By the last injection, dramatic improvement in the respiratory symptoms occurred and the sputum no longer yielded the mucoid pseudomonads on culture.

Special Laboratory Studies

Each culture of mucoid pseudomonad from the various sputa samples was serially subcultured and their phage susceptibility compared to a group of mucoid and non-mucoid pseudomonads which had been obtained from other patients. As indicated in Table 2, the mucoid pseudomonad remained constant and distinct in its phage susceptibility.

Phage was also identified in each of the patient's mucoid pseudomonad cultures by treatment with chloroform followed by centrifugation at 2500 xg to remove the debris of the lysed bacteria, then at 25,000 xg of the supernatant to recover the pellet of phage-active material. A suspension of the



Fig. 2. Electronmicrograph of P. aeruginosa in sputum showing hexagonal structures resembling phage. Stained with lead citrate x 50,000.

saline washed pellet was tested for phage activity against a group of phage-free P. aeruginosa. The results of such studies indicate that the same pseudomonad phage was present in all of the patient's sputum samples over a period of eighteen months (Table 2).

About one liter of the patient's sputum was collected in July, 1966, and kept frozen until analyzed for the pseudomonad polyuronide of O-acetyl alginic acid by the procedure of Linker and Jones.4 The pseudomonad polyuronide was separated from epithelial mucus by pronase digestion of the latter, with calcium precipitation of alginate followed by treatment with alginase and by hydrolysis and identification of alginic acid on chromatograms. The presence of the alginic acid polyuronide in the sputum was not surprising, since this material was derived from the pseudomonads which were present in marked numbers in the stained smears of the sputum. Electronmicrographs of the sputum were obtained after glutaraldehyde and osmium fixation and epoxy resin embedding.6,9 Electronmicroscopically, the numerous pseudomonads varied somewhat in size and capsular material (Fig. 1). Formed phage was not identified extracellularly but hexagonal structures morphologically resembling phage were observed within some of the pseudomonads (Fig. 2).

Sweat tests with "fibros" paper (Colab, Inc.) were negative in the patient and her available relatives, a 35-year-old niece and her five children, 10 years to four months of age.

Discussion

Pseudomonas aeruginosa is usually a commensal organism. Infections with this microorganism are frequently secondary to debilitating disease or changes in anatomic structures; as for example, in leukemia, cutaneous burns and cystic fibrosis. The mucoid form of Pseudomonas aeruginosa has been particularly associated with pulmonary disease in cystic fibrosis. 1,2 In the present case, the primary pathogenetic role of the mucoid pseudomonads in the respiratory tract is uncertain since the microorganisms were identified in the sputum late in the long course of bronchopulmonary disease. After their initial identification, the pseudomonads appeared to have a causal relationship with the respiratory disease, being recovered from the sputa on each recurrent attack. The mucoid pseudomonads were the only microorganism cultured from bronchial washings and formed a prominent component of the sputum in the electron-micrographs. Despite a favorable therapeutic response with antibiotics to which the mucoid pseudomonads were sensitive in vitro, the microorganisms persisted, and when isolated on each such attack, had a similar in vitro sensitivity to antibiotics and contained the same phage.

The success of the autogenous vaccine in eradicating the mucoid pseudomonads, which had persisted under antibiotic therapy in the tracheobronchial tree, emphasizes the importance of immunologic mechanisms in the control of Pseudomonas infections. Feller and Kamei¹⁰ used a vaccine from a pseudomonad strain for immunization against Pseudomonas septicemia in burned patients. Alexander, et al.,11 obtained antigenic material of high molecular weight from a pseudomonad which protected rats against the pathogenic strain. Agglutination tests showed cross antigenicity with 51 of 112 pseudomonad strains. The chemical nature of the infection-protective antigen was not determined but the material could be obtained by several extractive procedures including 0.15 M NaCl wash of live microorganisms precipitated with 60 per cent ethanol. Such extractive procedures could yield mixtures of proteins, nucleic acids and polysaccharide or polyuronide. Liu, et al.,12 reported that the poorly antigenic "slime layer" of the pseudomonas aeruginosa elicited the agglutinating antibodies which also protected against active invasive infection.

In the present case, the "slime layer" was unusually abundant and was found to be due to acetylated alginic acid, a polyuronide previously observed in several mucoid pseudomonad strains recovered from tracheobronchial secretion of patients with cystic fibrosis.3,4 The frequency of occurrence of the mucoid pseudomonad in the altered bronchial tree suggests that the alginic acid coating may permit the microorganism to maintain a partially commensal relationship within the bronchial mucus and to be less susceptible to antibodies and to antibiotics. Perhaps the autogenous vaccine leads to the destruction of the intrabronchial organisms through enhanced circulating antibody levels or to cellular antibodies.

Another interesting aspect of infection

with mucoid pseudomonads is the apparent dependency of the mucoid production upon phage infection. Phages have been found to induce mucoid production in non-mucoid pseudomonad strains.⁵ The phage could either induce the de novo elaboration of the abundant O-acetylated alginic acid through lysogenic conversion ^{13,14} of related material or markedly accelerate the production of the same substance. The various antigenic components of the mucoid pseudomonads may have been more effective when introduced subcutaneously than when they were released within bronchi or alveoli dur-

ings attacks of bronchopulmonary infection. Apparently the phage exists in both lysogenic and carrier states in the pseudomonad. Autogenous vaccine containing products of both mucoid pseudomonads and its associated carrier phage might be expected to produce antibodies against the phage as well. Destruction of lysogenic or carrier phage in the patient's respiratory tract may have resulted in the loss of the mucoid property by the pseudomonads with reversal to the non-mucoid form which was more vulnerable to the effects of antibiotics and antibodies.

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Maternal Viral Infections

Some viruses, such as rubella and human cytomegalovirus, are known to cross the placental barrier and infect the fetus. In other cases of maternal viral infections, such as herpes simplex, evidence for transplacental passage is less convincing and fetal damage or neonatal disease may be coincidental or associated with perinatal infection. Certain cases of fetal or neonatal disease following maternal viral infections may be associated with disease in the mother which affects her metabolic processes or the placenta in such a way as to interfere with development of the fetus and infant.

The possible effects of transplacental viral infections are several. Fetal loss may occur by means of abortion or stillbirth. There may be infection of the fetus, with clinical manifestations such as rash, or without clinical manifestations. The infant may be born with congenital defects, including such deformities as cataracts, cardiac anomalies, mental retardation or cerebral palsy.

Although a number of maternal viral diseases have been etiologically incriminated in congenital defects, only two—rubella and cytomegalovirus infection—are definitely proved to be associated with anomalies or mental retardation in infants. Harry T. Wright, Jr., California Medicine (Nov.) 1966.

Maolate (Chlorphenesin Carbamate) A New Myanalgic Drug In Industrial Medicine

JAMES J. CALLAHAN, M.D./CHICAGO

Musculoskeletal syndromes, arising chiefly from occupational injuries comprise a major part of the practice of industrial medicine. While most of these painful muscle and joint conditions are self-limiting, and while most respond well to prompt and careful therapy, patients are often so disabled initially that they lose time from work-and this is a critical factor when both patients and physicians are compensated by industry. To shorten the period of disability, analgesic and muscle-relaxant drugs are frequently prescribed. In our experience, unfortunately, there is no single drug that is completely satisfactory. When an adequate dose of a muscle-relaxant or analgesic agent is given, side effects such as drowsiness often prevent the patient from performing efficiently and safely on the job even if he is otherwise physically fit for the particular task. We are therefore reluctant to prescribe effective doses of these agents unless the patient is confined to his home or is in a hospital.

A new drug, Maolate (chlorphenesin carbamate), has recently been under clinical investigation for the relief of pain and discomfort associated with various types of muscle trauma and inflammation. Although Maolate is chemically related to mephenesin and has some similar pharmacologic properties, it is better identified as a myanalgic drug, i.e. one whose main activity is directed at muscle pain. This myanalgic effect is predominent in contrast to the muscle-relaxant activity commonly associated with mephenesin analogues. Published clinical studies 1-6 have established that this activity is superior to placebo, and equal or superior to carisoprodol (Rela, Soma), aspirin and meprobamate (Miltown, Equanil). Of equal importance, side effects such as drowsiness were

Dr. Callahan, Callahan Clinic, is Professor and Chairman of Orthopedic Surgery, Stritch School of Medicine, Loyola University, Chicago. reported to be minor and of little clinical significance. No toxicity has as yet been reported. This paper reports on an open-label study of 74 patients with pain arising from occupational musculoskeletal injuries.

Pharmacology

Maolate is chemically 3- (p-chlorophenoxy) -2-hydroxypropyl carbamate and has the following structural formula:

Pharmacologic studies in several species of animals have shown that this compound is a centrally active, orally potent skeletal muscle-relaxant agent. Maolate is well tolerated, rapidly absorbed from the gastrointestinal tract and rapidly excreted, chiefly in the urine. It is a derivative of mephenesin and has a similar selective internuncial blocking action. This has been proven by the fact that while the monosynaptic potentials of the spinal cord were either not affected or were augmented, the polysynaptic potentials were selectively depressed. Maolate is effective as an antagonist of convulsions produced by strychnine or supramaximal electroshock but not of pentylene tetrazol convulsions. Although ineffective in standard pharmacological tests for analgesia, it was five times as effective as aspirin in alleviating pain produced by flexion of silver nitrate inflamed ankle joints in rats.7 In chronic toxicity studies in dogs and rats for extended periods and at high doses (ranging between 50 and 100 mg./kg. daily) no toxic effects were observed.

In humans, Maolate has a biologic half-life of 3.5 ± 0.2 hours. Rapidly absorbed from the gastrointestinal tract, maximum serum levels are achieved in from one to three hours after administration. Maolate is excreted rapidly, chiefly in the urine. No serious toxic effects were observed in over 2,700 patients and adult volunteer subjects comprising 55 separate studies.⁸

Table I Improvement in Pain After Three Days of Therapy

	No. of Patients	Severity of Discomfort					Percent of	
Condition		Severe		Moderate			Patients Showing Imp.	
		Un.	Imp.	M. Imp.	Un.	Imp.	M. Imp.	and M. Imp.
Fractures	3	1	0	1	0	0	1	66.6%
Contusions	42	1	12	16	3	6	4	90.5%
Sprains	12	0	4	6	0	0	2	100.0%
Lumbo-Sacral	17	1	5	6	3*	1	1	76.5%
Strains TOTALS	74	3	21	29	6	7	8	88.0%

1* patient was worse. Un. = Unchanged

Imp. = Improvement M. Imp. = Marked Improvement

Material and Methods

The study group consisted of 74 adult patients presenting a variety of moderate to severe musculoskeletal conditions. There were 67 men and seven women with an age range of 17 to 64 years and a mean age of 36 years. All were reasonably healthy working people before injury. The duration of the conditions prior to the study with Maolate ranged from less than one day to over one week. Most of them were of very short duration, 44 of one day or less. The dosage of Maolate was one tablet (400 mg.) q.i.d. for three days. All patients were asked at the three day follow-up examination and interview to report any side effects. No other drugs were given during the treatment period. An evaluation of "marked improvement" indicated that relief of pain was complete or almost complete, "improvement" indicated that there was some relief of pain. Twelve patients failed to return at three days. Since these were compensation cases it was assumed that they were relieved of their pain and were therefore considered as markedly improved. In our experience, patients will always return or at least contact us by telephone if their conditions are not significantly improved.

Results and Conclusions

Table I shows the degree of improvement from pain by diagnostic category and also by the severity of the condition. Of the total 74 patients, 88 per cent were either improved or markedly improved and 12 per cent were unchanged or worse. In the group of 53 patients classified as having moderate pain, 94.3 per cent experienced improvement or

marked improvement-54.7 per cent had marked improvement and 39.6 per cent had improvement. Of the 21 patients classified as having severe pain, 71.4 per cent experienced improvement or marked improvement—38.1 per cent had marked improvement and 33.3 per cent had improvement. We believe that it is significant that in both of these groups a higher percentage had marked improvement than improvement.

The only side effect reported was one case of nausea. As has already been pointed out, sedative side reactions are frequently seen after administration of muscle-relaxant and analgesic drugs. That no such reactions occurred with Maolate in this study is important considering our type of practice. It must be kept in mind, however, that therapy lasted only three days and that some sedative side reactions might have appeared if Maolate had been given longer. Nevertheless, we believe that Maolate has less tendency to cause drowsiness than other similar drugs we have used in the past.

In summary, we feel that Maolate is an effective myanalgic agent against the pain and discomfort arising from musculoskeletal injuries. The study indicated that the drug worked promptly without causing any reactions that would prevent a patient from returning to work as quickly as his injury permitted.

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Medical Management Of The Tension Night Eater

By Frank L. Bigsby, M.D. and Cayetano Muniz, M.D./Chicago

The problems of the obese have been many, too diversified, and too complex to warrant a standard treatment. This has resulted in a variety of plans: the "air force diet," the metred-drink diet, the nibbling diet, the starvation diet, and the chorionic gonadotropin injections plus dieting; "antiobesity" agents such as shot-gun prescriptions, laxatives, sedatives, bulk agents, vitamin reducing candies, and "water pills"; hypnotism; and machines for passive exercise. 1

Professional care of the obese patient ranges from outright refusal to help that may be accompanied by advice to "push yourself away from the table," to schemes whereby the patient exerts little or no effort and relies on oral or parenteral prescriptions. The latter may be accompanied by tape-recorded messages, propaganda literature, and other short-cuts for true personalized care. ¹

The great need in the management of the obese patient is a comprehensive method of approach that merits universal acceptance. A practical method for obtaining a more thorough understanding of obese problems is to categorize different cases to a degree that will facilitate analysis and discussion. One of the most perplexing types of obesity the physician may encounter is the tension night eating syndrome.

Predictable Physiological Response

Individuals experiencing the disturbed eating pattern typical of this heretofore intractable syndrome present a definite clinical picture. There is a predictable physiological response and a peculiar nutritional pattern. These patients come from all walks of life, their daily routines are commonly disturbed by cares, troubles and difficulties (real or imagined). Successful management requires therapy under what is a normal existence for each individual. To afford

treatment after removal from the causative environment, by hospitalization and fasting, for example, is irrational and can afford little in the way of permanent control. Excessive physiological tension is a constant, and an outstanding, finding. For this reason amphetamine compounds alone, or in combination with barbiturates or so-called tranquilizers, have been ineffective or contraindicated.

This patient may open the first medical interview by stating, "If all you can do for me is prescribe an appetite drug, let's not waste each other's time. I have tried them all and can't take even the mildest forms."

Search for Carbohydrates

The typical tension night eater obtains little or no satiation at the dinner table. A search for carbohydrates commences immediately after dinner. The patient eats without appetite or hunger and is genuinely perplexed when the excellent intentions of dieting and to maintain self control vanish. Such a patient eats almost nothing throughout the day and usually subsists on coffee and carbohydrates. There is strong evidence to indicate that the state of physiological tension is at a high level. There is a tendency to insomnia. Many patients open the first medical interview stating that all forms of appetite curbing drugs had failed because preparations strong enough to reduce the appetite produced too much nervousness and insomnia. Patients frequently experience a mid-afternoon fleeting episode of low blood-sugar characterized by tired feeling, irritability, nausea, and a vague desire for something to eat or drink. This may be documented by six hour glucose tolerance tests in many instances. This type patient is in fact his own "reducing drug" during the daylight hours, for his nervous system response to various stimuli causes normal appetite to disappear. Insight is often poor.

After all, does he not "diet" all day? Have all the authorities who for years advocated that "pushing away from the table is the best exercise" been mistaken? I do better than that, this patient will reason; I don't even go to the table until dinner time! Regardless of best intentions food at dinner is gulped, is tasteless, and second or third servings are common. Meanwhile, the patient berates himself for his incomprehensible actions.

Tense, Alert, Anxious

Examination will reveal a tense, alert, anxious patient who displays an attitude toward airing the various aspects of disappointing experiences in past reducing programs. The weight may be highly variable; some patients may be as much as one hundred pounds over their normal weight, others may not be overweight and consult the physician because of extreme psychic frustration accompanying the inability to control the compulsive nature of their night time nutritional excesses. The pulse pressure may be low, a blood pressure reading of 105/95 is common. The pulse rate is often rapid.

Differential Diagnosis

It is necessary to distinguish this syndrome from other forms of compulsive eating, and from other types of night eating.

Obese compulsive eaters are constant snackers; they seldom sit down to a regular meal. This compulsive pattern is due to emotional tension rather than physiological tension that is seen in compulsive night-time hyperphagia. Food is utilized as a weapon to combat anxieties and is consumed day and night. The housewife frequently refers to herself as the "garbage pail for the children," and even seems proud of the fact that she eats on the run. She is completely disorganized; the constant eating of anything at hand is but one evidence of manifold problems as she progresses through a disorganized day. Other diagnostic features are an unusually high tolerance for amphetamine compounds (often habituation), and absence of routine late afternoon hypoglycemic episodes.

The late-late night eater does not indulge in snacks between dinner and retiring for the night but, after being asleep for some time, awakens and is unable to fall asleep once more unless he eats. The explanation for this phenomenon is unclear. It is conceivable that the physiological response to food corrects a mild hypoglycemia. A second possibility is that cerebral ischemia, resulting from the flow of blood to the splanchnic area, acts as a sleep-inducing factor. A third possibility is that late eating alleviates hunger pangs.

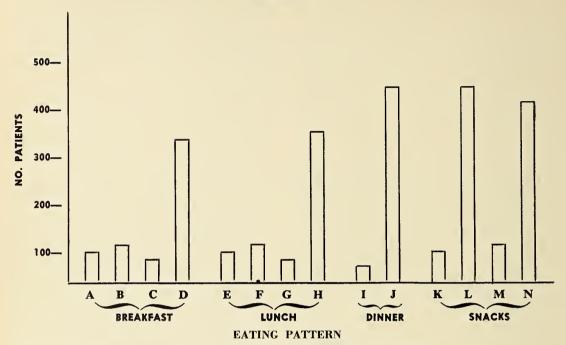
The mid-evening snacker eats at night as a matter of habit, or conditioned reflex. The night eating can actually be due to relaxation rather than tension, providing the patient with a sense of security and well-being. The eating pattern is not compulsive in any respect. Physiological tension is not common, thus amphetamine sensitivity is rare.

In nutritional obesity the eating pattern closely parallels that of the tension eater. The nutritional obese patient develops his eating pattern as a result of years of poorly supervised "dieting" and calorie counting. With him, all sense of nutritional balance has vanished. He has no understanding of what comprises an intelligent reducing regimen. In the tension night eater the picture is one of physiological tension. In the nutritional obese person it is ignorance of what constitutes balanced nutrition. Differential diagnosis is established by the absence of insomnia, lack of gulping food, negative history of amphetamine sensitivity, and no clinical evidence of hypoglycemic episodes.

The hobby eater will reach for carbohydrates at any hour because of the pure joy derived from tasting the delicacies. The ingestion of calories is never hurried; there is no compulsive pattern. Physiological tension is nil. Hypoglycemic episodes are never clinically discernible. This individual is the most stable type the physcian may encounter in the field of disturbed eating patterns.

Every clinical aspect has been considered in order to develop satisfactory therapy for the tension night eating syndrome; the eating pattern, psychotherapeutic factors, the outstanding degree of physiological tension, the incidence of clinical manifestations of hypoglycemic episodes, and the possible role of the hypothalamus were carefully studied.

Of all factors observed, the clinical manifestation of a late afternoon hypoglycemic episode was so constant that it came to be regarded as pathognomonic in the diagnosis of the tension night eating syndrome. In most instances it was observed that, once evidence of a fleeting hypoglycemic episode was established, the patient was certain to



- A. No breakfast
- B. Coffee only for breakfast
- C. Full breakfast
- D. Coffee & roll for breakfast
- E. Hot meal for lunch
- F. No lunch
- G. Salad or fruit for lunch
- H. Sandwich & beverage for lunch
- I. Very light or no dinner
- J. Full meal, often with second servings
- K. Patients who never snack
- L. Patients who snack sometime during 24 hour period
- M. No. of patients out of 472 who start snacks in A.M.
- N. No. of patients out of 472 who start snacks after 4:00 P.M.

To illustrate the high incidence of night eaters in obesity a study of 500 consecutive new obsese patients was made. The eating pattern at breakfast, lunch, dinner, and snack time was recorded. The results of this study are shown in Chart I.

At breakfast 71 of 500 patients ate nothing, 75 of 500 had coffee only, 52 of 500 had full breakfast (including animal protein), 302 of 500 had "coffee and" (toast, roll, or juice).

At noon 56 of 500 patients had a hot meal, 68 of 500 had no lunch, 49 of 500 had salad or fruit only, 327 of 500 had sandwich and beverage.

At dinner 21 of 500 patients had very light meal or nothing, 479 of 500 had main meal.

Only 28 of 500 patients stated that they never snack, 472 of 500 snacked sometime during 24 hour period.

(a) Sixty of 472 started snacks between breakfast and lunch.
(b) Four hundred and seventeen of 472 started snacks after 4 p.m. (after school, preparing dinner, immediately after dinner, TV time, bedtime, or during night).

begin the compulsive search for carbohydrates before his day was concluded. It is entirely possible, but not proven in humans, that this phenomenon is related to the sensitivity of certain hypothalamic cells to changes in blood glucose levels. To be successful, therefore, in relieving the compulsive hyperphagia typical of this syndrome, it was concluded that the clinical manifestation of hypoglycemic episodes must be controlled. The methods available for this control include chemotherapy to minimize phys-

iological tension and night time hyperphagia, caloric re-education, and specific dietary measures to control functional hypoglycemia.

Sympathetic Nervous System

We have seen that the clinical evidence of excessive physiological tension is outstanding in the tension night eating syndrome. The role that stimulation of the sympathetic nervous system may play in promoting hypoglycemia is well understood. Early sym-

pathetic stimulation results in hyperglycemia by eliciting release of glucose into the blood stream from liver reserves of glycogen. Sympathetic stimulation may be enhanced by heavy caffeine intake, nicotine inhalation, and poor nutritional habits in the early hours of the day. The initial hyperglycemia elicits liberation of insulin with subsequent hypoglycemia and the triggering mechanism typical of compulsive night-time post-prandial hyperphagia. In some instances hypersensitivity of Island of Langerhans cells to caffeine initiates hyperinsulinism and a fleeting episode of hypoglycemia.

The parasympathetic nervous system may produce functional hypoglycemia via stimulation of the involuntary motor fibers of the right vagus nerve (the secondary fibers to the gastric glands and pancreas). The resultant hyperinsulinism and hypoglycemia may be instrumental in triggering compulsive

hyperphagia.

In view of excessive physiological tension so prevalent a barbiturate is indicated; a suitable barbiturate also helps control cortical stimulation and insomnia.

Amphetamine Late in Day

An amphetamine prescribed late in the day as an anorexigenic agent is indicated to control night-time hyperphagia and eventually promote a sound, long-term, prudent nutritional pattern with improved appetite for breakfast and lunch. These objectives must be accomplished before the caloric principles necessary for weight loss can be applied. Amphetamines allay the sensation of hunger, and although this effect appears to be related to stimulation of the central nervous system, their exact mechanism of action as appetite suppressants has not been explained. It has been suggested, but not proved, that they act on appetite-control centers of the hypothalamus and thus have a central regulatory effect. Amphetamines should not be considered until caloric re-education and barbiturates have controlled the clinical manifestations of late afternoon hypoglycemic episodes. Only the mildest forms of appetite suppressants designed for late day use should then be prescribed at 4 p.m., and after.

Weight loss cannot be considered a criterion for efficacy in this program. Control of the compulsive night-time eating pattern is the primary objective and required as a basis for accepted caloric measures compatible with weight loss to be introduced later.

The program that has evolved from clinical trial has resulted in a change of our attitude toward patients suffering from compulsive hyperphagia of the night eating syndrome. These patients were originally considered the most difficult of all to manage in an objective manner. The efficacy of the following comprehensive program is repsonsible for this change of attitude:

- A. Mild sedation should be employed when indicated to control physiological tension.
- *B. The night eater should eat balanced dinner (leave 1/4 portion of each food served).
- *C. Should curtail late afternoon and after dinner snacks.
- D. Should drink 3 ounces unsweetened orange juice with breakfast, two hours after breakfast, and one hour before dinner.
- E. Should drink 6 ounces skim, or 2%, milk three hours after lunch.
- F. Should not take amphetamine drug prior to 4 p.m.
- G. Must curtail caffeine intake (coffee, hot chocolate, cola and many diet cola drinks, strong brewed tea).
- H. When late day eating is controlled the patient must learn to eat high protein, low carbohydrate, breakfast and lunch.

*Poor motivation may be improved in B and C by prescribing mild anorexigenic compound at 4 p.m. and 8 p.m. after hypoglycemic episodes are controlled.

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Maolate

(Continued from page 305)

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Home Health Services

Continuing efforts to hold down the costs of hospital and medical care have been responsible for many innovations in the manner in which health care services are delivered. Among the innovations has been the further development of home care and home health services so patients may be released from the hospital earlier, as well as for patients whose illnesses do not require hospitalization, but do require certain professional services. Added impetus has been given to home health services by Medicare, which pays for designated services for Social Security beneficiaries. To provide physicians with a better understanding of home health services, the ISMS Division of Public Relations and Economics talked with Dr. Roger Sondag, chief, Division of Hospitals, Chronic Illness and Medicare, Illinois Department of Public Health.

Doctor Sondag, we hear much today about home health services. Is this a new concept in patient care?

Not at all. Care of the sick in the home dates back to the earliest days of the practice of medicine. However, with the rapid technological advances in medicine both in the physician's office and hospital insurance, as well as in modern well-equipped hospitals, the picture changed considerably over the past 20 years. With the advent of Medicare which provides for home health services, there is now a re-emphasis to utilize this type of care which has always been an accepted part of the total health care picture.

What is meant by home health services?

An arrangement for providing—under medical supervision—needed skilled nursing and other supportive services to a sick



Roger Sondag, M.D. Chief, Division of Hospitals, Chronic Illness and Medicare, Department of Public Health

or disabled person in his home can be called a home health service.

Can you name other supportive services?

Yes, physical, occupational, or speech therapy; medical social services under the direction of a physician; part-time or intermittent services of a home health aide; medical supplies (other than drugs and biologicals) and the use of medical appliances, while under a home health service plan.

How are these services provided, Doctor Sondag?

In a variety of ways through a variety of agencies. Some of the agencies in Illinois which have become eligible for participation in the health insurance program include:

*Visiting nurse association

*Local health department

*Combination visiting nurse associationhealth department agency

Department of a hospital, medical school, medical clinic, extended care facility or rehabilitation facility offering home health services.

What does a home health service program mean to the physician?

The doctor is provided with a single source from which he can order needed nursing, social, rehabilitative and related services for his patient. The program, in effect, becomes an extension of a total medical care plan.

Doctor Sondag, what are the physician's responsibilities when he refers a patient for home care?

It's up to the doctor to provide home health agency personnel with a specific plan of treatment for the patient. He can expect regular reports from the personnel providing the services. Finally, he should know the various methods by which his patients can pay for—or be assisted in paying for—such services.

What are some of those payment methods?

At present, Illinois offers little in the area of private health insurance coverage for these services. Commercial carriers have not moved into the field and while I understand that Illinois Medical Service (Blue Shield) has an experimental program underway in Cook County—such coverage isn't generally available from the Blues plans.

Then, actually, a person referred for home health services must rely upon private means to pay costs?

Not all of them. Persons over 65 eligible for Medicare receive services as defined in the law. The Medicare benefits provide up to 100 home health visits under Part A and 100 visits under Part B.

Under Title XIX of the Social Security Act, the Department of Public Aid can pay for persons under 65 who are eligible and unable to pay for medical, hospital and home health services.

Does Medicare pay all the costs?

Under Part A, it pays the full cost of all covered home health services. Under Part B, it pays 80 per cent of the reasonable costs after the patient has met his yearly \$50 deductible requirement. When the patient is under 65, he and his family may

pay all or part of the costs. When there is a deficit, the agency providing home services receives funds from Community Chest or United Fund, tax funds, gifts, or bequests.

What services does Medicare cover?

Well, included are part-time or intermittent nursing; physical, occupational or speech therapy; medical social services; use of medical appliances; services of home health aides; and services of interns or residents in an approved hospital training program. While these services must be available and provided to the patient at home, the cost of patient services provided in a hospital, are covered when the equipment needed is available only through the hospital.

What does the nurse do in the home health service?

First of all, she studies the physician's plan of service—the patient's diagnosis, medical orders, goals, dietary regime, and the nursing care plan from the hospital.

With this as a background, she helps the patient and family to understand and carry out the physician's orders. Family strengths are noted and fostered as a way to help the patient and family through a crisis or a long siege of illness or convalesence.

The nurse gives nursing care, including help to the patient in the activities of daily living, and helping family members give care and assistance between nursing visits. As you can see, her functions in the family setting are different than in the hospital.

What services are specifically excluded from coverage?

Full-time nursing care, for one. Others include drugs and biologicals; personal comfort items; general housekeeping services, and "meals-on-wheels."

Does Medicare pay the patient's transportation expense to an outpatient facility to receive a covered service?

No. Nor will it pay under Part A for services furnished by an agency operated primarily for the treatment of mental illness.

What conditions must a home health agency meet before it can participate in Medicare?

First, it is primarily engaged in providing skilled nursing services and at least one other therapeutic service directly to the patient (if indicated). It can have arrangements with another public or non-profit, voluntary agency to furnish other services which it does not provide directly.

Are those the only qualifying conditions?

No. Medicare requires that an agency's policies must be established by a professional group which must include at least one or more physicians and one or more registered nurses. Services provided must be supervised by a registered nurse or a physician and clinical records must be maintained on all patients. There must be proof of non-profit status and, finally the agency must be certified by the Social Security Administration based on surveys and recommendations of the Illinois Department of Public Health.

How many home health agencies in Illinois are qualified for Medicare participation?

As of this time 83—most of which are operated by local health departments or visiting nurse associations.

How can physicians determine the home health agencies available in their areas?

An up-to-date list of certified home health agencies is available from the Medicare Section, Division of Hospitals and Chronic Illness, Illinois Department of Public Health. For current list of approved home health agencies, see Annual Reference Issue, *Illinois Medical Journal*, to be published next month.

How does a patient qualify for home health service benefits?

Under Part A of Medicare, he qualifies if he has been hospitalized for three consecutive days—and if arrangements are made for home health services within 14 days after his discharge from the hospital or an extended care facility and the physician establishes a plan for treatment. Hospitalization is not required to qualify for home health services under Part B.

What is required of the physician?

Both Part A and Part B require a plan for services to be provided the patient. This must be established by the physician, and he must review that plan at least every two months. In fact, every time he reviews the plan, he should initial it and indicate the date

Specifically, what should the doctor's plan show?

One, it should identify the types of services required. To the extent possible, it

should provide a long range forecast of likely changes in the patient's condition. He should include his diagnosis, indicate the nursing services that will be needed, and the drugs and medications to be used. In addition, he might prescribe a diet, list the activities to be permitted and list the therapy, medical and social services, plus the supplies and appliances which will be needed. (Hospital nursing staff can give pertinent suggestions from the patients nursing care plan and nursing contacts with the patient.)

What happens to the physician's written plan?

After he signs it, he gives it to the home health agency which will provide services to the patient. Incidentally, the agency must have certification from the physician that the patient needed home health services before Medicare will pay the agency. Recertification by the physician at least every two months is also required.

What form is used for physician certification of the medical necessity for home health services?

There is no specific form. The certification can be handled in any way, just as long as the fiscal intermediary can determine—if necessary—that the certification and re-certification requirements have been met. The home health agency is responsible for keeping the doctor's certification in the patient's record folder.

Doctor Sondag, let's go back to the physician's treatment plan. May this plan be changed if such action is indicated?

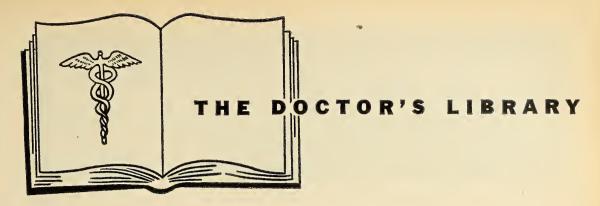
Certainly. But any changes must be made in writing and signed by the physician or by a registered professional nurse on the agency's staff— upon the oral direction of the attending physician. And, of course, all changes in orders for dangerous drugs and narcotics must be signed by the doctor.

If a patient is eligible for services under both Part A and Part B, which program pays the cost?

The services must first be charged against the hospital insurance, or Part A. If additional visits are necessary, then Part B can be used.

A patient is entitled to 100 "visits" a year under each program—what constitutes a visit?

The Department of HEW has defined a (Continued on page 338)



TEXTBOOK OF OBSTETRICS AND GYNECOLOGY. Edited by David N. Danforth, M.D., by 43 authors. Hoeber Medical Division, Harper & Row, Publishers, Inc., New York & London, 1966. 1164 pages, 858 illustrations, \$27.50.

The new Textbook of Obstetrics and Gynecology, edited by Dr. David N. Danforth, includes contributions by 43 distinguished physicians and clinicians, representing 30 medical schools. The specialties of obstetrics and gynecology have been combined into a single text to avoid duplication. The subject matter is presented in logical sequence to conform with the teaching in most medical institutions and is aimed at the undergraduate student.

This 1164-page book has 858 illustrations and is larger than most student textbooks dealing with either obstetrics or gynecology. The book covers the basic essentials along with sections on genetics, radiologic diagnosis in obstetrics and gynecology, the physiology and detailed evaluation of the newborn, and the urinary tract as it relates to gynecology. Also included are chapters on infections and tumors of the female genital tract.

Although the book is directed primarily to the medical student, it should be of interest to residents and practitioners. A detailed consideration of the principles and techniques of gynecologic surgery is presented.

T. R. Van Dellen, M.D. Editor

OSLER'S TEXTBOOK REVISITED. A. M. Harvey and V. A. McKusick. Appleton-Century-Crofts, New York, 1967. 361 pages, \$6.75

It is fun to browse through old medical books, and Harvey and McKusick must have had this pleasant pastime in mind when they reprinted several sections from the textbook of William Osler. They made a wise choice by including typhoid fever, syphilis, lobar pneumonia, diabetes mellitus, acute Bright's disease, angina pectoris, and many other familiar disorders. Most of the chapters contain material to which succeeding years have added little, and is remarkable for its clarity and interpretation.

Commentaries by various authorities follow each chapter as to the progress that has been made since Osler's time. There is no doubt in their minds that his clinical observations were truly impressive and, in many instances, little can be added to his teachings. These comments are excellent.

T. R. Van Dellen, M.D. Editor

Practical Endocrinology. James H. Hutton, M.D., Charles C. Thomas, Springfield, Ill., 1966. 99 pages, \$5.50.

This 99-page monograph incorporates a series of lectures given by Dr. James H. Hutton to the house staff of Illinois Central Hospital. These lectures proved so practical and interesting that they were published in book form.

This volume is not a textbook of endocrinology. The author attempts to raise the clinician's index of suspicion on common disorders of the ovary, testes, and the pituitary, thyroid, parathyroid and adrenal glands. The last two chapters are on obesity and commercially available drugs of endocrinologic interest. The latter is a reprint of an article by Dr. Robert J. Ryan. Hutton discusses the symptoms and findings that suggest endocrine abnormalities with a minimum of complicated laboratory procedures. The physical appearance of the patient is stressed along with helpful diagnostic hints obtained from the appearance of the skin, hair, nails, and teeth. There is a bibliography of the most important books consulted and an excellent index.

T. R. Van Dellen, M.D. Editor

SOCIO ECONOMIC news

A service of the Public Relations and Economics Division

Public Aid Fees Reductions Draw Complaints

Problems are apparent in the Public Aid medical payment program. Physicians complain that the Illinois Department of Public Aid is cutting their usual, customary and reasonable fees. Public Aid officials admit that some fees have been reduced. But they point out that IDPA paid doctors nearly \$1 million more in the first five months of 1967 than in the comparable period for 1966. Some confusion-and reduced payments- result from the use of the wrong procedure code number on billing forms. Doctors are sometimes frustrated when they try to find why they are paid less than they are billed. To ease that problem, IDPA this month will provide a standard "inquiry" form which doctors may obtain from county departments of public aid. The form will elicit all information IDPA needs to give a doctor a quick explanation of the reduced fee. Meanwhile, the ISMS Board of Trustees has pointed out that physicians are encouraged to negotiate a disputed fee with IDPA. But if no agreement is reached, both doctors and IDPA may appeal to the local county medical society. The appeal should be directed to the society's Advisory Committee to Public Aid, which may then refer it to the committee responsible for fee adjudication. Once that committee has acted, it should report back to the Advisory Committee, which will relay the decision to IDPA.

State to Enforce Mandatory Fluoridation

Illinois joined Connecticut and Minnesota to become the third state to initiate a state-wide program of mandatory fluoridation of public water supplies. Dr. Franklin Yoder, Director of the Illinois Department of Public Health, noted that 144 Illinois communities have natural fluorides in their water supplies, while another 192 add artificial fluorides. That means some 6.3 million persons—or 74.8 percent of the state's population-drink fluoridated water. Among larger communities now without fluoridation are Springfield, Alton, Belleville, Bloomington, Champaign-Urbana, Chicago Heights, East St. Louis, North Chicago, Pekin and Granite City. Regulations developed by the Illinois Department of Public Health will require these and all other Illinois cities to maintain a flouride content of not less than 0.9 milligrams per liter nor more than 1.2 milligrams per liter in their public water supplies.

ISMS Protests Tax Proposal on Journal Advertising Revenue

ISMS has added its voice to the many protesting the Internal Revenue Service's proposal to tax the advertising revenues of publications of non-profit associations. Dr. Jacob E. Reisch, chairman of the *Illinois Medical Journal* committee, outlined ISMS' opposition in a letter to IRS Commissioner Sheldon S. Cohen. Dr. Reisch asserted that "imposition of a federal tax upon advertising income of a state medical journal would seriously curtail a necessary and related service" to ISMS members. He said the IRS proposal is both "arbitrary and contrary to existing law."

Set Record Straight on Tax-Deductible Gifts

Don't be misled on tax-deductible gifts to charitable organizations. The Internal Revenue Service says taxpayers have been advised erroneously by sponsors that the entire amounts paid for tickets to charity balls, bazaars, banquets and athletic events are deductible. If the amount paid for the ticket is the same as the standard admission charge for an event, it cannot be deducted for income tax purposes. However, if you want to support an event—but don't intend to use the ticket—you may make an outright gift without accepting the ticket, then deduct the donation.

Chiropractors Cannot Do Physical Exams on School Children

Chiropractors may no longer do physical examinations of Illinois public school children. Governor Kerner signed into law an amendment to the state's School Code which, among other things, requires that physical exams provided for in the Code may be done only by "physicians licensed to practice medicine in all its branches." This tightening of the legal language in the School Code now prohibits chiropractors from doing physicals.

New Insurance Bill Protects Handicapped

Another measure signed by Governor Kerner should ease the minds of parents with physically handicapped or mentally retarded children. The measure requires organizations underwriting health insurance to continue coverage of such children after they reach the age when coverage of a dependent child is normally terminated. The bill, effective on all policies written after Dec. 1, applies to medical service plans, hospital service corporations and voluntary health service plans, among others. To continue coverage, parents must provide proof to the carrier that a child is incapable of self-sustaining employment because of physical handicap or mental retardation. Parents must also show that the child is chiefly dependent upon them for support and maintenance.

Public Aid Rolls Increase

The number of persons receiving Public Aid in Illinois totaled 436,181 during May, according to the IDPA. This was an increase of 1,661 over the preceding month. In May of last year, there were 398,921 persons receiving aid.

Economic Impact on Community Without M.D. Proves Astronomical

What impact does lack of a physician have upon a community—for example, Astoria, Illinois? This agricultural and industrial mining community in the state's west-central section has 1,200 residents, but serves a trade area with a population of 8,000. The Sears-Roebuck Foundation es-

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timates that in the past 12 months, persons in the trade area suffered 6,072 separate illnesses which prompted 12,000 individual visits to doctors. That means approximately 40 patients a day visited physicians in Rushville (15 miles away), Havana (18 miles), Ipava (11 miles) or some other city. Collectively, Astoria patients traveled 154,000 miles round trip last year to consult physicians. In 12 months, according to the Sears-Roebuck Foundation, 25 percent of the trade area's population was hospitalized-in Havana, Rushville, Canton (35 miles away), or Macomb (30 miles). Seventy-seven percent were hospitalized for medical reasons, 20 percent for surgical and 3 percent for obstetrical. The Sears Foundation estimates that expenditures by Astorians for medical care in a year total \$42,550-based on office calls only. Estimated expenditures for medicine are \$31,910. In addition, residents spent an estimated \$3,080 for gasoline and oil to drive to and from out-of-town doctors' offices. The town suffered an additional economic loss of some \$32,300 because of purchases residents made in other communities while visiting doctors. There's little question that Astoria wants-and would support-a doctor. Any volunteers?

Marvin Schroder

THE MYCOPLASMA MYSTERY

In the past, doctors classified nonbacterial pneumonias as "atypical pneumonias." They split the atypical pneumonias into two groups: those without and those with cold agglutinins. The "without" group included those associated with an identifiable cause: ornithosis, Q fever, histoplasmosis. But the "withs" resisted classification and were lumped together under the convenient name "primary atypical pneumonia." Then the lump began to break up.

Virologists scoured the respiratory tree and found a host of possible causes. Among these was an atypical virus called "Eaton Agent." But was "Eaton Agent" a true virus? No, it turned out to be an atypical bacterium—a pleuropneumonia-like organism (PPLO)—in disguise.

In the course of these events the name of the disease was dutifully changed from "primary atypical pneumonia" to "Eaton Agent Pneumonia" to "pleuropneumonia-like pneumonia." They pointed out that the PPLO was really a bacterium of the genus mycoplasma. Why not call the disease "Pneumonia due to Mycoplasma Pneumonia?" And so it rests.

Alexander and his co-authors studied the incidence of pneumonia in patients in a large cooperative medical group in Seattle. They observed 1051 cases of pneumonia, an annual rate of 12.9 per 1,000.

The incidence of clinically-recognized pneumonia due to mycoplasma pneumonia was between 1 and 1.5 persons per 1,000. The pneumonia occurred most frequently in children and adolescents and had no seasonal correlation. Patients suffered from headache and fever, but almost none were hospitalized. They complained of upper-respiratory-tract problems more often than in other types of pneumonia, and more often showed white-count elevations. The physicians who saw the patients were usually right when they diagnosed the pneumonias as "atypical" or "viral." Abstract. Minnesota Medicine, April 1967.

Medicare Beneficiary Need Not Pay Deposit To Enter ECF

Medicare beneficiaries who enter extended care facilities following hospitalization should not be required to pay deposits as prepayment for services, Deputy Commissioner of Social Security Arthur E. Hess, has announced.

Hess was responding to reports that extended care facilities in a few areas are requiring medicare beneficiaries to advance deposits amounting to as much as \$300 or \$400 in some instances before they can be admitted.

Medicare pays all covered costs for 20 days of a posthospital stay in an extended care facility, but the beneficiary is responsible for a \$5 a day coinsurance payment for the 21st through the 100th day. Some facilities have said that the deposit, required upon admission, is to cover the \$5 a day coinsurance payment should the patient stay more than 20 days. Others have claimed that it is customary to charge patients a deposit before admittance to protect facilities against a loss.

There is no justification, the Social Security Administration believes, for an extended care facility to require prepayment of this \$5 a day as a condition of admission. Participating extended care facilities, Hess pointed out, have every reasonable assurance that they will be reimbursed for their costs in furnishing covered services to medi-

care beneficiaries for the full 100 days of their entitlement. Where the facility is in fact unable to collect the coinsurance and it is finally determined to be a "bad debt," the Social Security Administration reimbursement formula includes a provision for the inclusion of such losses.

With these policies in operation, Hess said, there would seem to be no need for deposits for covered services. "A requirement that would deny necessary extended care services to a medicare beneficiary because he is unable to make an advance payment would defeat the purpose of the medicare law," he pointed out.

Hess said that extended care facilities may properly require payment for services not covered by medicare, such as comfort items requested by the patient. But, he added, facilities participating in the program must not refuse admission to a beneficiary because of his inability to make advance payment of the coinsurance, nor may a facility evict or threaten to evict a beneficiary because he is unable to pay the coinsurance amount as it becomes due.

When the beneficiary has used up his 100 days of care under medicare, the facility may then ask for a deposit toward additional care, but the facility cannot require that this deposit be made while the patient is still receiving medicare benefits.

THEFT OF HOSPITAL SUPPLIES SHOWS SHARP INCREASE

Employee dishonesty is costing hospitals 80 percent more than it did five years ago. About \$80 million in cash and material was stolen by hospital personnel in 1966—a sum equaling 2 percent of hospital purchases for the year, according to Norman Jaspan, author of The Thief in the White Collar, a book that describes the scope of stealing in business offices.

Speaking at a meeting of hospital accountants at Ohio State University, Jaspan said a national survey by his New York consulting firm showed that non-cash losses in hospitals amounted to \$70 million in 1966. Theft of food supplies totaled \$40 million; merchandise, \$20 million; and drugs, \$10 million. The drug figure was based on the price paid by the hospitals.

Food theft ranged from employees eating meals free of charge when their job privileges did not include meals, to personnel making deals with truck drivers to leave some merchandise on the vans. This merchandise was later sold by hospital employees and drivers who split the profits. Drug losses included the sale of free samples by hospital pharmacy employees. World Medical News, August 4, 1967, page 16.

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Abstract:

American Thoracic Society Report of Ad Hoc Committee on Current Status of Hospital Facilities for Tuberculosis

By Robert J. Dancey, M.D./Danville

	Tuberculosis Hospital	Beds
	Facilities, U.S.A.	Occupied
1954	669	95,000
1961	432	49,000
1965	387	37,000

This committee report is chiefly an attempt to make a qualitative evaluation of tuberculosis hospital facilities now existing in the United States, respecting standards of patient care and opportunities for professional training. The evaluation is based upon answers to questionaires which were mailed to the medical directors of all nonfederal and Veterans Administration (VA) tuberculosis hospital facilities having 10 or more tuberculosis beds, and it reflects the situation as of Dec. 31, 1963. With each questionnaire was sent a copy of the American Thoracic Society (ATS) "Standards for Tuberculosis Hospitals" (see Am. Rev. Resp. Dis., 1962, 85,120), with the suggestion that it be used as a yardstick.

For reference the committee used the National Tuberculosis Association-U.S. Public Health Service Joint Committee report (Public Health Service Publication No. 930 E-4, Dec., 1963) entitled "Area Wide Planning of Facilities for Tuberculosis Services," although that report deals mainly with guidelines for the States in planning for closure and consolidation of hospital facilities.

Besides asking for numerical data the questionnaire requested the medical directors' comments about recent or impending changes in their institutions, and their predictions of future trends in hospitalization for tuberculosis. Replies were received from 315 of the 413 nonfederal institutions queried, and from 68 of the 70 VA hospitals. Data from 321 hospitals was sufficiently complete for tabulation.

Types of Auspices

Among the 321 hospitals the types of auspices represented were state (80 hospitals); county-city (137); other (36); and VA (68). The types of hospital service or facility were tuberculosis only (nonfederal 118, VA 1); tuberculosis and other chronic conditions (84 and 2); tuberculosis service in general hospital (51 and 57); and other (0 and 8).

Fifty-five percent of the reporting hospitals had less than 100 tuberculosis beds each. Bed occupancy was less than 70 percent in 40 percent of hospitals under county or municipal auspices, in 30 percent of state hospitals, and in 10 percent of VA hospitals. Per diem cost in nonfederal hospitals operated for tuberculosis only was under \$15 in 46 percent and over \$25 in 14 percent; in hospitals for tuberculosis and other chronic conditions it was under \$15 in 30 percent and over \$25 in 28 percent; in tuberculosis services of general hospitals it was over \$25 in 63 percent. Eighty-four percent of the VA tuberculosis services were in general hospitals, and in these the perdiem cost was over \$25 in 86 percent. Different accounting methods as well as differences in types and qualities of services are probably partly responsible for the wide variations in per diem costs.

Grading of Facilities

Physical facilities were graded excellent-to-good by the large majority of medical directors, but the committee views these subjective opinions with reservations, and points out that there has been very little new tuberculosis hospital construction in the past decade. The committee believes there are still several regions in the U.S. where new construction is justified by a continuing need for tuberculosis beds and obsolescent facilities, but favors the principle that all new tuberculosis hospitals should be built as elements of regional medical centers.

The abstract is from the American Review of Respiratory Disease, 94:265-74, August 1966.

Evaluation of hospital services: The great majority of medical administrators graded the quality of their medical staff and medical consultative and thoracic surgery services "excellent to good," but they frequently reported the following deficiencies or shortages affecting quality of care:

(1) Shortage in psychiatric services.

(2) Shortage of staff physicians, whether trained or untrained in pulmonary disease.

(3) Deficiency in laboratory services, usually due to shortage of trained personnel.

(4) Inadequacy of social services, except

in VA hospitals.

(5) Deficiencies in rehabilitation services, although the need for these has declined because of shortened hospitalization for the young, and because of the increased ratio of patients who remain unemployable because of age, physical impairment, alcoholism, or other personality problems.

(6) Deficiencies in the quality of posthospital outpatient treatment, both in health department clinics and by private

physicians.

(7) Sketchy or perfunctory medical records and statistics.

Student nursing training programs: The majority reported that nursing services were adequate, but many deplored the decreasing opportunities to provide undergraduate training in tuberculosis hospital nursing and in public health nursing. Training programs for student nurses were reported by 125 of the 321 hospitals.

Intern-residency training program: Respondents to the questionnaire often stated that medical students and interns now do not have sufficient experience with pulmonary tuberculosis in hospitals and outpatient services. Several reasons for this are discussed. Such training was being provided

in 117 of the 321 hospitals.

At the residency level, the 1961 "delisting" by the AMA Council on Medical Education of hospitals and services approved for training in the subspecialty of pulmonary diseases had several unfortunate effects relating to care of tuberculosis patients. Thoracic surgery residencies, however, are increasing in number and are in demand; some 37 percent are filled by foreign graduates.

Training of foreign medical graduates: According to the committee, the interest of the ATS in this matter is not directed at solving the staffing problems of tuberculosis hospitals, but at improving postgraduate training in pulmonary disease generally, for improvement of the tuberculosis patient's care both here and abroad. To circumvent certain difficulties in this field. the ATS recently adopted a plan to assist foreign medical graduates to obtain placement in pulmonary disease training programs in the U.S., beginning with graduates from Latin America. At the time of the present study, of the 321 hospitals, 106 stated they accepted foreign medical graduates, and an additional 83 said so with reservations.

Trends in the hospital care of tuberculosis: In general, the committee makes the following interpretations of replies received, in light of the experience of its members:

- (1) The reductions in the new active case rate and in length of hospital stay for tuberculosis have slowed since 1960. At the same time, the patient population is becoming older, and contains increasing proportions of alcoholics and patients with complicating nontuberculous medical problems, particularly chronic obstructive lung disease, and a decreasing proportion requiring, or suitable for, thoracic surgery.
- (2) For several reasons, wider acceptance of patients with pulmonary tuberculosis by most general hospitals does not seem likely. There has been a growing tendency to admit patients with nontuberculous chronic lung disease to tuberculosis hospitals and to accept tuberculous patients in "chronic pulmonary disease units" at certain general hospitals. Removal of legislative or other regulatory barriers to such consolidation seems justified.
- (3) The essential place of hospital care, at least in the initial stage of management, including diagnosis, isolation, individual programs of therapy, and patient education, must be emphasized. The hospital outpatient department, too, has a valuable role to fill in patient follow-up and in examination of contacts.

It is important that a sufficient number of hospital beds continue to be available now and in the future for treatment of patients with tuberculosis, and that outmoded facilities be replaced by modern ones. The most pressing problem of tuberculosis hospitals is that of retaining personnel, particularly medical staff and labora-

(Continued on page 334)

The Needs of the Catholic Patient

By The Rev. John Marren, M.A.S.T.L./Chicago

the evening.

The relationship of the Catholic patient to his priest is an extremely important one in time of sickness-especially if the patient's condition is critical, or if his illness appears terminal. It is from the priest that he receives the sacraments which will meet his needs at the time of confinement.

Catholic hospitals—as well as many other larger hospitals-have fulltime Catholic chaplains assigned to them. In other hospitals, the spiritual care of Catholic patients is assigned to a nearby Catholic parish priest. Through daily or weekly visits, the priest establishes a familiarity with the patient that enables him to be of even greater spiritual assistance than would otherwise be possible.

The priest maintains a record of his assistance so that if he is not available, any other priest can immediately ascertain what has been done for the patient. When the patient's condition is critical, the priest will include in the hospital records those sacraments which have been administered. The sacraments include:

CONFESSION: This is the sacrament of penance. When the priest visits the patient he will hear the patient's confession, if this is requested. If at all possible, the nurse, doctor and other hospital personnel should allow the priest to hear the confession without interruption.

HOLY COMMUNION (Sacrament of the Eucharist): The chaplain will provide every opportunity to the Catholic patient to receive Communion frequently while he is hospitalized. The usual time for Communion is in the morning, but it may be brought to the patient at other times. Frequently-and especially before surgery-

ment of Extreme Unction): When a Cath-

ANNOINTING OF THE SICK (Sacraolic patient's condition is such that he could die, he should receive this sacrament. It is the annointing of the eyes, ears, nostrils, lips, hands and feet (the five senses) with blessed oil, accompanied by prayers asking God's help toward his recovery. The sacrament can be given to any Catholic over the age of seven.

Communion is brought to the patient in

When a patient is placed on the critical list, the Catholic chaplain should be notified so that he may give this sacramenteven if the patient is not conscious. If there has been a sudden death and the sacrament has not been received, the priest will administer the sacrament conditionally, in the hope that there is still latent life. For the patient's benefit, the priest should assist him when he is conscious—hence, the importance of alerting the chaplain to the patient's serious condition.

SACRAMENT OF BAPTISM: Catholics believe in the absolute necessity of Baptism toward salvation. Consequently, there is great anxiety on the part of those responsible for a patient that this be done if the sacrament has not already been received. Usually a person listed as a Catholic will have been baptized. But there may be exceptions, especially in the case of infants and children. It is important that an inquiry be made at the time of admittance to the hospital as to whether this sacrament has been received. Catholic women will be concerned about the baptism of a miscarried fetus or embryo. The information on this and other emergency procedures can be obtained from the Catholic chaplain.

SACRAMENT OF CONFIRMATION: (Continued on page 342)

Father Marren is pastor of the Holy Trinity Church of Chicago, and he is a member of the Illinois State Medical Society's Committee on Religion and Medicine.



LITHIUM FOR MANIA

In 1949, Dr. J. F. J. Cade published an article in the Medical Journal of Australia on the use of lithium carbonate in the treatment of psychotic excitement. American psychiatrists were somewhat skeptical of the agent because lithium chloride had been used in the United States as a salt substitute for cardiac patients and many were poisoned.

The results of recent clinical investigations show the drug to be promising. According to these reports,1,2 the chemical has proved to be far superior to phenothiazine derivatives in calming those suffering from manic depression. Improvement usually occurs in four to 10 days. Side effects such as nausea, diarrhea, and a fine tremor, appear simultaneously with improvement making it necessary to reduce the dosage until a maintenance regimen just below mild toxicity can be established. Following administration of the agent, patients describe "the feeling of being internally 'curbed' by lithium," in that they are unable to talk, think, or move as fast as they would like. Feelings such as these usually subside after six weeks.

In a Danish study, 88 women³ suffering from recurrent depressions or repeated manic-depressive episodes were given lithium prophylactically for periods of one to five years. "Without lithium treatment, re-

lapses occurred on the average every 8 months, during treatment, only every 60 to 85 months. Without lithium treatment the patients spent on the average 13 weeks in a year in a psychotic state, during lithium treatment less than 2 weeks."

Sixty-eight manics⁴ were treated with the drug by Dr. George Schlagenhauf. All improved, and within three weeks of admission most were discharged. A threeyear follow-up revealed that virtually none had experienced a recurrence of their psychosis.

Lithium induces a pronounced calming effect within eight to 10 hours. Treatment should be given initially in a hospital where the patient can be closely observed for side reactions to the agent. The investigational new drug is available at chemical supply houses. According to the FDA, 46 U. S. investigators are conducting experimental trials of lithium carbonate.⁵ None have filed a new drug application.

T. R. VAN DELLEN, M.D.

References

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Digest pages 9-10 (Aug.) 1967.

2. Ralph N. Wharton and Ronald R. Fieve. The Use of Lithium in the Affective Psychoses. Mental Health Digest pgs. 11-12 (Aug.) 1967.

3. Paul Christian Baastrup and Mogens Schou: Lithium as a Prophylactic Agent, Mental Health Digest pgs. 10-11 (Aug.) 1967.

4, 5. Calming Chemical Averts Manic Attacks. Medical World News pg. 34 (Aug. 18) 1967.

INDIAN TIGER HUNT

After stewing about tiger shooting for 10 years, I finally made the decision last year to go to India. We made arrangements through Hunters and Hunters of Bombay, India. Prince Hira Sinh and Prince Masud, the Thakur Saheb of Amod were our guides. We left Idlewild Airport on the evening of Feb. 8. After a touchdown breakfast in London, lunch at Frankfort, tea in Rome, we landed via Air India in Bombay at six in the morning on Feb. 10. This was a remarkable jet flight a la red carpet Indian service. We took the train to Nagpur that night and arrived by jeep at Camp Kolsa, near Chanda on the 11th. On the morning of the 12th we went out target shooting and to get the "feel" of our rifles. I used a Holland fourshot 375 magnum with special shells made here. On the evening of the 12th we left camp for a leopard hunt. Only a few minutes out of camp we spotted a tiger who apparently was waiting for his prey (dinner). Before leaving camp all guns were carefully loaded for instant firing. I was sitting in the front seat with the driver and had a perfect shot at the tiger at about 50 yards. He got up and ran into the forest and I was sure that I had missed him. The hunting aids detected something which they interpreted as a death snarl. It was dark now and following a long consultation it was decided not to go into the forest, but come back at six o'clock the following morning.

At camp everybody celebrated with a drink and the Prince was quite elated and astonished about the quick tiger shot. He said it was fantastic and almost unbelievable that anyone could achieve his "tiger kill" so quickly and easily. His remarks were emphasized later when I talked to other hunters who had not seen a tiger after months of hunting.

At six o'clock the next morning the whole camp was awake and waiting. We went out and found the tiger dead about 50 yards in the forest. He traveled for apparently 100 yards from the place where he was hit. After taking pictures and movies the tiger was carefully placed into the jeep. It took eight

(Continued on page 344)



Albert G. Boeck, Jr., who recently resigned as Director of Publications and Scientific Services for the Illinois State Medical Society, is shown with plaque presented by ISMS Board of Trustees in recognition of his seven years of service to the society. He is shown with Board Chairman Arthur F. Goodyear, M.D., Decatur.

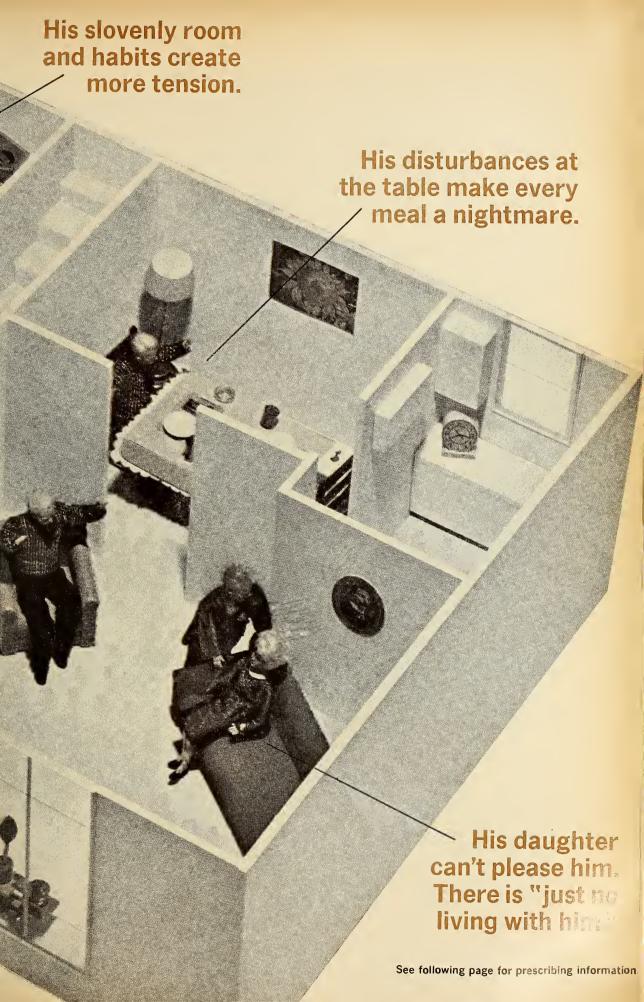
Riker Develops Urinary Tract Anti-Bacterial Agent

A new urinary tract anti-bacterial agent—HIPREX (methenamine hippurate)—developed by Riker Laboratories, has proved to be highly effective against a broad spectrum of urinary tract pathogens. It is particularly useful in difficult-to-treat infections caused by specific strains of bacteria. The drug was to be marketed in September.

Its therapeutic effectiveness has been demonstrated in a wide variety of acute, chronic or recurrent infections in both the upper and/or lower urinary tract. Symptomatic relief is usually evident within 24-72 hours. Studies conducted with children in the 6-12 age group have shown similar satisfactory results.

The recommended dose of one tablet twice daily assures patient cooperation in following the dosage schedule and helps avoid missed doses.

Riker engages in pharmaceutical product research, development and manufacture. Its products include a wide range of prescription and non-prescription pharmaceuticals sold throughout the free world.



When the agitated geriatric disrupts the home...

Anxiety that seriously interferes with the individual's performance at work, at home, or in the community may be regarded as moderate to severe in degree.

Mellaril often recommends itself to the treatment of moderate to severe anxiety because it

- helps control the most frequent symptoms: marked tension, agitation, apprehension, restlessness, hypermotility
- often alleviates anxiety-induced somatic complaints
- frequently helps strengthen emotional resources
- helps the patient maintain realistic contact with environment, closer harmony with family

Thus, when you consider the anxiety moderate to severe...consider Mellaril.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.

Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recommended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.

Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.

Before prescribing, see package insert for full product information.

for moderate to severe anxiety

Mellaril[®] (thioridazine)
25 mg. t.i.d.



President's Page

(Continued from page 247)

ficiency in reporting to the Board of Trustees.

Although the new system will be shown in explicit detail next month in the *Journal*, it might be helpful to explain here what the councils are and how they will operate. Although the Board has appointed chairmen for all the councils—as well as all committees—the names cannot be announced until the respective appointees have had time to accept the assignments.

First, because of their nature, there are certain committees within the Board of Trustees; that is, their membership in most cases is composed of trustees only and they are not connected with any of the councils. These committees include Advisory to the Woman's Auxiliary, Archives, Committees, Constitution and Bylaws, Educational and Scientific Foundation, Executive, Finance, Journal, Osteopathic Problems, Policy, and Usual and Customary Fees. These are either provided for in the Bylaws or have been assigned to the Board for efficiency and control.

All other committees report to one of the following councils, which in most cases are made up of an appointed chairman plus chairmen of various related committees.

- A. Judicial Council.
- B. Council on Legislation.
- C. Council on Scientific Advancement.
- D. Council on Medical Service.
- E. Council on Medical Education.
- F. Council on Public Relations.

Look for a complete list of personnel, functions of the committees, and diagrams of the council system in next month's *Journal*.

American Thoracie Society

(Continued from page 319)

tory technicians. Social and psychiatric services need strengthening. Adequate and well trained medical staffs are needed, not only for the immediate good of the patient, but also to maintain centers of training in tuberculosis and other pulmonary disease for medical students, nurses, interns, residents, public health physicians, and physicians in practice.

Talwin - brand of pentazocine (as lactate)

Contraindications: Increased Intracranial Pressure, Head Injury, or Pathologic Brain Conditions in which clouding of sensorium is undesirable. Talwin (brand of pentazocine) should not be administered in these cases, since drug-induced sedation, dizziness, nausea, or respiratory depression could be misleading.

Precautions: Pregnancy. No teratogenic or embryotoxic effects attributable to the use of Talwin have been seen in extensive reproductive studies in animals; however, like all new drugs, Talwin should be given with caution to pregnant women. A large number of patients in labor have received the drug with no adverse reactions other than those that occur with commonly used strong analgesics. However, as with other strong analgesics, Talwin should be used with caution in women delivering premature infants.

Ambulatory Patients. Since sedation, dizziness, and occasional euphoria have been noted, ambulatory patients should be warned not to operate machinery, drive cars, or unnecessarily expose themselves to hazards.

Certain Respiratory Conditions. The possibility that Talwin (brand of pentazocine) may cause respiratory depression should be considered in treatment of patients with bronchial asthma. Talwin (brand of pentazocine) should be administered only with caution and in low dosage to patients with respiratory depression (e.g., from other medication, uremia, or severe infection), obstructive respiratory conditions, or cyanosis.

Patients Dependent on Narcotics. Because Talwin is a narcotic-antagonist, patients dependent on narcotics and receiving Talwin may occasionally experience certain withdrawal symptoms. Talwin should be given with special caution to such patients. It has been observed that some patients previously given narcotic-analgesics for one month or longer had mild withdrawal symptoms when the drug was replaced with the analgesic, Talwin. After a short period of adjustment the subjects were usually able and willing to continue taking Talwin, and relief of pain was satisfactory.

Nonaddicted Patients Receiving Narcotics. Symptoms believed to be indicative of antagonism to the opiate may be observed rarely with administration of Talwin to patients receiving opiates for a short time. Intolerance or untoward reactions are seldom observed after administration of Talwin to patients who have received single doses or who have had limited exposure to narcotics.

Impaired Renal or Hepatic Function. Although laboratory tests have not indicated that Talwin (brand of pentazocine) causes or increases renal or hepatic impairment, the drug should be administered with caution to patients with such impairment. Extensive liver disease appears to predispose to greater side effects (e.g., marked apprehension, anxiety, dizziness, sleepiness) from the usual clinical dose, and may be the result of decreased metabolism of the drug by the liver.

Myocardial Infarction. As with all drugs, Talwin (brand of pentazocine) should be used with caution in patients with myocardial infarction who have nausea or vomiting.

Biliary Surgery. Until further experience is gained with the effects of Talwin on the sphincter of Oddi, the drug should be used with caution in patients about to undergo surgery of the biliary tract.

Adverse Effects: Talwin is relatively free from the undesirable side effects associated with morphine, such as constipation, urinary retention, or severe respiratory depression. Furthermore, Talwin produces less nausea, vomiting, and diaphoresis than meperidine.

In over 12,000 patients who received Talwin intramuscularly, subcutaneously, or intravenously, nausea, the most frequent adverse effect, occurred in approximately 5.0 per cent. In decreasing order of occurrence were vertigo, dizziness or lightheadedness; vomiting; and euphoria. Respiratory depression was reported as an adverse reaction in 1.0 per cent.

The incidence of each of the other adverse effects was well below 1.0 per cent: constipation, circulatory depression, diaphoresis, urinary retention, alteration in mood (nervousness, apprehension, depression, floating feeling), hypertension, sting on injection, headache, dry mouth,

flushed skin including plethora, altered uterine contractions during labor, dermatitis including pruritus, dreams, paresthesia, and dyspnea occurred rarely after administration of Talwin (brand of pentazocine). Furthermore, each of the following adverse reactions occurred in less than 0.1 per cent: tachycardia, visual disturbance (blurred vision, diplopia and nystagmus), hallucinations, disorientation, weakness or faintness, muscle tremor, chills, allergic reactions including edema of the face, taste alteration, insomnia, diarrhea, cramps, and miosis; laryngospasm in one patient.

Talwin has not produced severe respiratory embarrassment in adults (never apnea), even with large amounts. A small number of newborn infants whose mothers received Talwin during labor had transient apnea. The incidence of temporary diminution in the rate or strength of uterine contractions is low after administration of Talwin, similar to that following meperidine hydrochloride. (In reporting no interference with normal labor in patients receiving Talwin, one investigator further stated that the drug may increase uterine activity.) Generally, no significant fetal heart rate change occurs.

Laboratory tests of blood and of liver and kidney functions have revealed no significant abnormalities. A minimum and probably insignificant increase in the per cent of eosinophils in peripheral blood counts and bone marrow occurred occasionally.

Talwin is well tolerated by patients with diabetes mellitus, and no changes in insulin requirements have been observed.

Dosage and Administration: Adults, Excluding Patients in Labor. Average recommended single parenteral dose is 30 mg., by intramuscular, subcutaneous, or intravenous route; may be repeated every three to four hours. Pain has been relieved in most patients with not more than three doses daily. Infrequently, selected patients have received single doses as high as 60 mg. Patients in Labor. A single, intramuscular 30 mg. dose has been most commonly administered. An intravenous 20 mg. dose has given adequate pain relief to some patients in labor when contractions become regular, and this dose may be given two or three times at two- to three-hour intervals, as needed.

Children Under 12 Years of Age. Since clinical experience in children under twelve years of age is limited, the use of Talwin (brand of pentazocine) in this age group is not recommended.

Duration of Therapy. Patients with chronic pain who received Talwin for prolonged periods (e.g., over 300 days) experienced no withdrawal symptoms even when administration was stopped abruptly; furthermore, there was no tolerance to the analgesic effect.

CAUTION. Talwin should not be mixed in the same syringe with soluble barbiturates because precipitation will occur.

Treatment of Overdosage or Respiratory Depression. Talwin has not produced apnea or severe respiratory embarrassment in adults, even in large doses. Occasionally, however, moderate respiratory depression may occur. Means of maintaining oroper oxygenation should be available in case of overdosage or respiratory depression, and methylphenidate (Ritalin®) should be administered parenterally. The usual narcotic-antagonists, such as nalorphine, are not effective respiratory stimulants for depression due to Talwin.

How Supplied: Ampuls of 1 ml., containing Talwin® (pentazocine) as lactate equivalent to 30 mg. base and 2.8 mg. sodium chloride, in Water for Injection. Boxes of 10, 25, and 100.

Multiple dose vials of 10 ml., each 1 ml. containing Talwin (pentazocine) as lactate equivalent to 30 mg. base, 2 mg. acetone sodium bisulfite, 1.5 mg. sodium chloride, and 1 mg. methylparaben as preservative, in Water for Injection. Boxes of 1.

The pH of Talwin solutions is adjusted between 4 and 5 with lactic acid and sodium hydroxide.

Winthrop

Winthrop Laboratories, New York, N.Y. 10016

mudrane

for

- EMPHYSEMA
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS



Each tablet contains:

Back tacter contains:	
Potassium Iodide195	
Aminophylline130	mg.
Phenobarbital, Caution: May be habit forming 21	mg.
Ephedrine HCl	mg.

FEDERAL LAW PROHIBITS
DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG—Formula, dosage and package identical to Mudrane—except—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC. RICHMOND, VIRGINIA 23217

Manufacturers of ethical pharmaceuticals since 1856



Drug Industry Cited for Foreign Relief

Dr. William Van Valin, chairman of the Direct Relief Foundation and the National Council of AMDOC, has hailed the pharmaceutical industry as the "unsung heroes behind the Direct Relief program, which is shipping some \$12 million worth of American drugs annually to some 25 million medically worthy persons in 50 foreign countries."

He spoke at the recent annual meeting of both organizations. Under the AMDOC program, American doctors are sent to medically underprivileged areas. Under the Direct Relief program, drugs are sent to the same areas.

Dr. Van Valin, formerly associated with Dr. Albert Schweitzer in Africa and Dr. Fom Dooley in the Far East, presented Riker Laboratories, the ethical pharmaceutical division of Rexall Drug and Chemical Co., with a certificate honoring the company for its contribution to the medically underprivileged around the world.

Home Health Services

(Continued from page 312)

"visit" as a "personal contact" in the patient's home by an agency staff worker for the purpose of providing a covered service. It is counted as a visit if a staff member from another agency working under contract with the home health agency provides a service to the patient. If the patient goes on an outpatient basis to a hospital, extended care facility or rehabilitation center for a service, it counts as a visit.

When can a patient use the 100 visits available to him under Part B of Medicare?

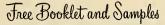
Only after he has used up all the benefits under Part A— provided of course that he is eligible for Part B benefits.

What's the procedure for billing Medicare for home health services provided to patients?

The physician, of course, does not bill for the services provided by the home health agency. The agency does that. The doctor is paid only for his personal services to the patient. He may either bill the patient directly, or accept an assignment from the patient, in the same manner that he is paid for services to Medicare beneficiaries who are not receiving home health services.



- The nut-like taste is pleasing. Infants readily accept this hypoallergenic formula that is completely fibre-free. An exclusive process results in a consistency much like milk.
- Soyalac is strikingly similar to mother's milk in composition and ease of assimilation. Clinical data furnish evidence of Soyalac's value in promoting normal growth and development.
- Excellent for regular infant feeding, too—and for growing children and adults.



A request on your professional letterhead or prescription form will bring to you complete information and a supply of samples.



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MEDICAL PRODUCTS DIVISION

RIVERSIDE, CALIFORNIA Mount Vernon, Ohio, U.S.A.



THE VIEW BOX-

By Leon Love, M.D. Director, Dept. of Diagnostic Radiology, Cook County Hospital, Clinical Professor of Radiology, Chicago Medical School.



Fig. 1.

This 23 year old white female entered Cook County Hospital with a six-month history of irregular menses and pelvic pain. Physical examination revealed a palpable pelvic mass in the region of the left ovary.

WHAT'S YOUR DIAGNOSIS?

(Answer on page 342)



AMODEX® Timed capsules

Each AMODEX TIMED CAPSULE contains:
dextro-amphetamine HC1
amobarbital (barbituric acid derivative) 60 mg.
WARNING: may be habit forming

DOSAGE: One capsule on arising or at breakfast. Drugs are released gradually over 6 to 8 hours, providing therapeutic effect for 10 to 12 hours.

INDICATIONS: AMODEX Timed Capsules elevate the mood, relieve nervous tension, restore emotional stability and emotional capacity for physical and mental effort. AMODEX Timed Capsules are extremely useful in the treatment of anxiety states and may be used to control appetite in the management of the obese patient — without nervous excitation.

SIDE EFFECTS AND PRECAUTIONS: Frequent or continued use may cause nervousness, sleeplessness, or restlessness. Individuals suffering from high blood pressure, heart disease, diabetes, thyroid disease, lung ailments, or kidney disorders should not take this product. It should not be taken over a long period of time.

CONTRAINDICATIONS: Hyperexcitability, agitated pre-psychotic states. Sensitivity to Amphetamines or Barbiturates.

CAUTION: Federal Law prohibits dispensing without prescription. SUPPLIED: In bottles of 30, 100, and 1000 capsules.

Fellows Testagar

pharmaceuticals since 1866
Detroit, Michigan

The View Box

(Continued from page 340)

Diagnosis: Ovarian dermoid.

Approximately one-third of the dermoid cysts of the ovary contain some calcium usually in a tooth or toothlike structure attached to one wall of a rounded pelvic mass. There dermoids vary in size and are often eccentric in position. There is usually enough lipid material within the mass to make it relatively radiolucent and when the combination of a tooth like structure within a radiolucent pelvic mass is present the diagnosis is almost certain.

Demonstration: Our case demonstrates an orange-size mass with tooth like structure and a fatty capsular component.

Medicine and Religion

(Continued from page 320)

If a Catholic patient has not received this sacrament and is dying, it is possible for the Catholic chaplain to administer it. Ordinarily, the Bishop administers the sacrament. There is, especially, great consolation for the parents of a dying child when this sacrament is given to the child who has not already received it.

Patients confined to hospitals or their homes are not obliged by the laws of the Church to attend Mass on Sundays or holy days. Days of abstinence are now limited to Ash Wednesday and the Fridays of Lent and do not oblige the sick and infirm, nor children under the age of 14. Days of fasting are Ash Wednesday and Good Friday and oblige only those who are between 21 and 59 and who are able to fast.

The Catholic Church does not have any prohibition against autopsies when they are for a worthwhile cause or reason. The matter is left up to the judgment of the individuals involved.

Ex-mental patient, if treatment has been adequate, should have good insight into himself, be able to deal with stresses of life and have satisfactory relations with others, according to Dr. Edward E. Landis, University of Louisville psychiatry professor. These are same qualities that make good employees and statement was made at mental health in industry seminar.

FDA Approves Navane, New Anti-Psychotic Drug

The Food and Drug Administration has approved the new drug application of Chas. Pfizer & Co., Inc. for Navane, a major new and potent anti-psychotic agent for the treatment of acute and chronic schizophrenic patients. The new drug, which parallels or exceeds the effectiveness of most phenothiazines (commonly used psychotherapeutic agents), will be made available to the medical profession by the company's J. B. Roerig Division at an early date.

Known by the generic name of thiothixene, the new drug was discovered and developed by chemists at the Pfizer Medical Research Laboratories at Groton, Conn., where a long-term program of research in brain chemistry is now being conducted. Pfizer was recently awarded a U. S. Patent Number 3,310,553 on this product. Pfizer scientists Barry M. Bloom, Ph.D., and J. F. Muren, Ph.D., are the inventors.

Double-blind trials have established Navane as a major anti-psychotic agent for the treatment of schizophrenia. It is effective in chronically ill schizophrenic patients, as well as those with acute schizophrenia.

Withdrawn, apathetic schizophrenic patients benefit specifically from Navane: alertness is improved, purposeful activity is increased. In addition, Navane has been helpful in the treatment of manifested psychosis and secondary symptoms of schizophrenia, such as hallucinations, tension and suspiciousness. Increased cooperation, social competence and interest, and greater personal neatness have also been noted.

Schizophrenic patients refractory to currently available psychotherapeutic agents may benefit through treatment with Navane.

Use of Navane in children under 12 years of age is not recommended because safe conditions for its use with children have not yet been established. It is contra-indicated in patients with circulatory collapse, comatose states, central nervous system depression due to any cause, blood dyscrasias, and in individuals who have shown hypersensitivity to the drug. No reports of photosensitivity or skin pigmentation have been received to date.

laolate°_{400 mg. tablets} hlorphenesin carbamate)

vanalgic for the relief of muscle pain relief of skeletal muscle pain and discomfort analgia*) associated with trauma or inflammation, cribe new Maolate. Maolate is effective—in cal investigations (double-blind placeborolled), good-to-excellent relief of muscle pain was ided for 86% of patients given Maolate; valent response obtained by only 56% of patients iving placebo.

late is prompt — peak serum concentrations are ned in 1 to 3 hours. Maolate is well tolerated — erious toxic effects were reported among more 2,700 subjects participating in 55 independent ies, but drowsiness occurred in 6% of the trial ects; dizziness in only 3%; however, caution ald be exercised by patients operating machinery chicles. Other side effects (also mild) were nore frequent than in controls on placebo. late is rapidly absorbed — peak serum centration reached in 1 to 3 hours. late is indicated as adjunctive therapy for symplace is indicated as adjunctive therapy for symplace in the symplectic in the sympl

atic relief of muscle pain in: ains, sprains, and direct trauma involving the

c, back and joints
 c syndrome (discomfort associated with increased
 cle tone and secondary to radiculitis)

cle tone and secondary to radiculitis)
ovitis-tendinitis

omyositis-myositis eoarthritis umatoid arthritis

n myos analgos (muscle without pain).

traindications: Hypersensitivity to drug. Safety for use regnant and pediatric patients not yet established; efore, use in such patients not indicated at this time.

but drug not recommended for patients with diagnosed attic dysfunction. Perform liver function studies at ular intervals on all patients on prolonged therapy, escially at high dosage. Drug has demonstrated mild sory dulling effects in patients treated for inflammatory raumatic conditions of skeletal muscle, therefore, warn ents operating motor vehicles or dangerous equipment aving potentially hazardous jobs.

erse Reactions: Infrequent and mild — drowsiness, tiness, nausea and epigastric distress. Occasionally, adoxical stimulation, insomnia, increased nervousness headache; reduce dose to control. Discontinue if skin or other evidence of hypersensitivity develops.

age: Up to 2 tablets three times a day until desired conse is obtained. Studies in normal volunteers constrate this dose tolerated at least 90 days without erse effect. However, most efficacy studies not run to than 21 days. Usual maintenance dose 1 tablet for establishing information this product, consult your Upjohn representative ee the package circular.

JA67 6936 @1967 by The Upjohn Con

w Maolate in strains, sprains and direct trauma disc syndrome 3. synovitis-tendinitis fibromyositis-myositis

Editorial

(Continued from page 330)

men to carry him out. He was 12 years old and weighed 550 pounds. More pictures were taken at camp before the skinners took over. After the pelt was removed I autopsied him. The bullet entered low in the neck, traversed the mediastinum, went through the heart and diaphragm, made multiple bowel perforations with an exit wound above the symphysis. Massive internal bleeding into the chest and abdomen was obvious. It seemed incredible to me that an animal could run 100 yards with a bullet hole through the auricle and ventricle.

I have hunted lions, leopards, elephants, rhinos, etc. in Africa, grizzly bears and mountain goats in Alaska, but the supreme thrill and satisfaction is to hunt and shoot an Indian tiger. He is still the ferocious king of the beasts. The tiger is a wary animal to bay. He is usually not an animal of habit or routine. As soon as a tiger routinizes his habits, he becomes an easy prey for a fine trophy.

Leander W. Riba, M.D.

Broad-Spectrum Antibiotic Announced

The first one-time-a-day broad-spectrum antibiotic was announced recently by Chas. Pfizer & Co., Inc.

The new drug, called Vibramycin (doxycycline; chemical name, a-6-deoxy-5-oxytetracycline) is 10 times more potent on a weight basis than tetracycline—the most-often prescribed broad-spectrum antibiotic—and is effective when administered once daily in a single 100 milligram dose after the first day.

Pfizer said the order approving Vibramycin in the *Federal Register* of Aug. 10 takes effect immediately.

The unusually low, once-a-day dosage schedule recommended for Vibramycin is a consequence of its greater oral absorption, and slow rate of excretion, which yields prolonged therapeutic blood levels of the antibiotic. Vibramycin, unlike other tetracyclines, is relatively unaffected by the intake of food or milk.

Vibramycin has a broad range of antibacterial activity against both gram positive and gram negative organisms, including infections of the respiratory and urinary tracts of man.

Fluoridation Bill Signed

Gov. Otto Kerner has approved Senate Bill 516, which requires the fluoridation of all public water supplies in Illinois.

"With the adoption of mandatory fluoridation as public policy," Governor Kerner said, "Illinois has taken a major step forward in the history of public health. I strongly concur with Dr. Luther Terry, former Surgeon General of the United States, who points out that fluoridation is one of the four basic preventive health measures of all time—ranking with the purification of water, pasteurization of milk and immunization against disease.

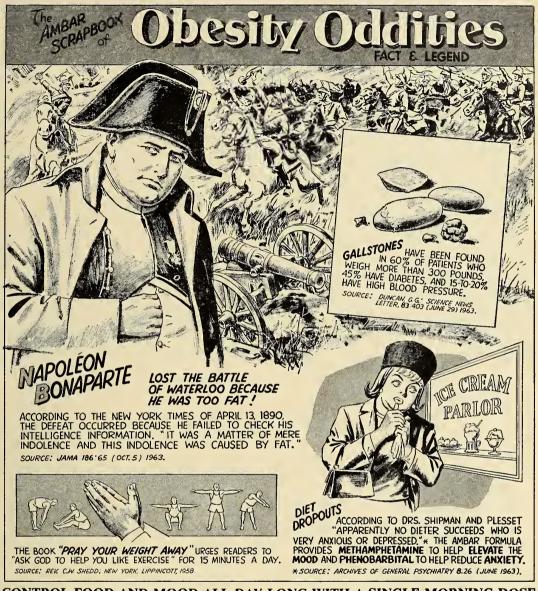
"The most completely documented study ever conducted on the subject of fluoridation was the Evanston Dental Caries Study here in Illinois, a study which irrefutably demonstrated that fluoridation prevents almost two-thirds of all dental caries in children and gives lifelong health benefits to the user. In addition, there is a substantial economic impact with families saving up to 50 percent in dental fees as a result of fluoridation.

"The Evanston research and more than 1,300 other studies have shown fluoridation of community water supplies is a safe, effective, practical, inexpensive and convenient way to prevent dental caries. In Illinois there are 144 communities with fluoride occurring naturally and another 192 communities where fluoride is added.

"About 6.3 million Illinoisans are presently drinking fluoridated water, either where it naturally occurs or where it is applied. The Department of Public Health has not received one report of ill effects on any citizen that can be attributed to fluorides, while there has been a significant reduction in dental caries in every location where studies have been made."

Governor Kerner pointed out that fluoridation is supported by such organizations as the Illinois State Medical Society, the Illinois State Dental Society, the Illinois Department of Public Health and the United States Public Health Service.

A blind electrician who installs electrical outlets in tract houses, a retarded kitchen worker who supervises "normal" employees and a cerebral palsy victim who is an electronics genius comprise a cross section of millions of handicapped Americans who are not handicapped on the job.



CONTROL FOOD AND MOOD ALL DAY LONG WITH A SINGLE MORNING DOSE

One Ambar Extentab before breakfast can help control most patients' appetite for up to 12 hours. Methamphetamine, the appetite suppressant, gently elevates mood and helps overcome dieting frustrations, Pheno-

barbital, the sedative in Ambar, controls irritability and anxiety...helps maintain a state of mental calm and equanimity. Both work together to ease the tensions that erode the willpower during periods of dieting.

Also available: Ambar #1 Extentabs®-methamphetamine hydrochloride 10 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

AMBAR #2 EXTENTABS

methamphetamine HCl 15 mg., phenobarbital 64.8 mg. (1 gr.) (Warning: may be habit forming).

BRIEF SUMMARY/Indications: Ambar suppresses appetite and helps offset emotional reactions to dieting. Contraindications: Hypersensitivity to barbiturates or sympathomimetics; patients with advanced

renal or hepatic disease. Precautions: Administer with caution in the presence of cardiovascular disease or hypertension.

Side Effects: Nervousness or excitement occasionally noted, but usually infrequent at recommended dosages. Slight drowsiness has been reported rarely. See package insert for further details.

A. H. ROBINS COMPANY, A-H-ROBINS

for September, 1967

Recommend Nationwide System of Care for Heart Attack Victims

The nationwide development of specialized hospital care facilities for all heart attack victims was strongly urged recently by the nation's authorities in coronary care.

The recommendation marked a broadening of the thinking of medical authorities who, until recently, have concentrated upon the establishment and operation of coronary care units mostly in the nation's larger hospitals because of the costs involved in equipping and staffing such specialized facilities.

The move to expand specialized coronary care services to all patients, no matter where they live or where they are treated, was one of several major recommendations agreed upon by more than 550 physicians, nurses and hospital directors attending the first National Conference on Coronary Care Units in Washington, D.C., June 24-25. The participants represented most of the 300 coronary care units presently in operation throughout the country.

The two-day meeting was sponsored by the American College of Cardiology, the American Heart Association Council on Clinical Cardiology and the Heart Disease Control Program of the U.S. Public Health Service's National Center for Chronic Disease Control. The three groups have been largely responsible for successful development of the nation's coronary care unit program which, in five years, has produced a tremendous reduction in the number of deaths from heart disease. Coronary care units are hospital areas specially designed, equipped and staffed to meet the total needs of heart attack victims. Most units presently are situated in larger hospitals of more than 250 beds.

Although small hospitals, for the most part, have difficulties in supporting a separate coronary care unit, conference participants, encouraged by the success of present units, agreed that it would appear advisable for small institutions to begin establishing coronary care units that would be available for heart attack victims on a demand basis, but available for other patients when not in use.

Six simultaneous sessions of the conference were devoted to discussions on the Training of Nurses and Physicians, Organization and Administration of Units,

Prevention and Treatment of Arrhythmias and Principles of Resuscitation, Aggressive Management of Congestive Heart Failure and Shock in Acute Myocardial Infarction, Problems with Monitoring and Equipment, and The Changing Role of the Nurse in Coronary Care Units.

In addition to urging an expansion of the program to meet the widespread needs of heart attack victims in all communities, large and small, the conference recommended that:

- -Specialized training programs be established for both physicians and nurses in coronary care units, particularly the training of a substantial number of physicians as directors of coronary care units and as sources of information to all physicians involved in the treatment of coronary disease.
- -Nurses, called "the first line of defense" in treatment of coronary victims, be specially trained to enable them to administer electrical shock treatment in certain cases and use certain drugs under specified conditions.
- —Participating hospitals support all measures, such as the pending Congressional legislation concerning the appointment of a Presidential commission on medical instrumentation, as a means of advancing the knowledge and safety of the application of instrumentation in coronary care.
- —More nurses be encouraged to enter the field of coronary care nursing as a means of alleviating the great shortage of specialized nursing personnel in the field. This could be accomplished by offering benefits beyond those presently provided regular duty hospital nurses.

Proceedings of the conference will be published.

A new addition to the AMA's film library is "Diseases of the Gall Bladder." This 12-minute, color, sound film, prepared by Hilger Perry Jenkins, M.D., Chicago, shows the varied nature of gall bladder disease as seen in the operating room, the surgical pathology laboratory and, in one instance, the morgue. A dozen cases are briefly presented to illustrate small and large gall stones, hydrops, empyema, gangrene, external fistula, carcinoma, adenomyoma and duplication. There is a \$3 service charge for this film.



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for topical antibiotic therapy with minimum risk of sensitization

Caution: As with other antibiotic products, prolonged use may result in overgrowth of nonsusceptible organisms, including fungi. Appropriate measures should be taken if this occurs.

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Tuckahoe, N.Y.



for September, 1967

MEETING MEMOS

Sept. 18—The Fourth Sumner L. Koch Postgraduate Course in Surgery of the Hand, jointly sponsored by the Department of Surgery, Northwestern University Medical School, and the Hand Surgical Service, Cook County Hospital, at the Cook County Graduate School of Medicine, Chicago.

Sept. 18-20—Sixth National Cancer Conference, sponsored by the American Cancer Society and the National Cancer Institute at the Denver Hilton Hotel, Denver, Colo. Subjects will include Biology of Cancer and the Cancer Cell, Basic Problems and Advances in Cancer Surgery, Evaluating Diagnostic and Therapeutic Techniques, Biochemistry of Cell and Virus Multiplications, Viruses and Cancer, Basic Problems and Advances in Radiation Therapy, Natural Products That Are Carcinogenic, and Basic Problems and Advances in Cancer Therapy and Hormone Therapy.

Sept. 20—Symposium on Clinical Aspects of Acute Leukemia and Burkitt's Tumor sponsored by the American Cancer Society and the National Cancer Institute at the Museum of Science, Boston, Mass.

Sept. 21-23—18th Annual Session of the American Association of Medical Clinics at the Drake Hotel, Chicago. Discussion topics include the health manpower shortage and regional medical programs. Guest participants will be Melville H. Hodge, Jr., Assistant Director, Information Systems, Lockheed Missiles and Space Co., Sunnyvale, Cal.; Philip R. Lee, M.D., Assistant Secretary for Health and Scientific Affairs, U.S. Department of Health, Education and Welfare, Washington, D. C.; Robert Q. Marston, M.D., Associate Director, National Institutes of Health, and Director and Chief of the Division of Regional Medical Programs, Bethesda, Md.; Roy F. Perkins, M.D., Director, Department of Health Care Services, American Medical Association, Chicago; Milford O. Rouse, M.D., Clinical Professor of Medicine, University of Texas Southwestern Medical School, Dallas, Tex., and President, American Medical Association; H. Doyl Taylor, Director, Department of Investigation, American Medical Association, Chicago, and Vernon E. Wilson, M.D., Dean and Director, University of Missouri School of Medicine, Columbia, Mo.

Sept. 24—Symposium on Clinical Medicine, to be presented by the Madison County Medical Society in cooperation with Lederle Laboratories, at the Schneithorst Holiday Inn, R.R. 4, Edwardsville. Topics include The Long Term Management of the Patient with Coronary Disease, Atherosclerosis—When Does It Begin—Can It Be Prevented, and Getting Along with Our Teenagers.

Sept. 25-26—27th Annual Congress on Occupational Health, sponsored by the American Medical Association, at the Regency Hyatt House in Atlanta, Ga. Subjects will include Small Plant Problems, Occupational Health Programs for Government Employees, Responsibility of the Physician in Off-the-job Accident Prevention, Occupational Health in Agriculture, Epidemiology of Occupational Medicine, and Cooperation Between Medical Societies and Workmen's Compensation Administrators.

Sept. 27-28—The fall program of the Illinois Obstetrical and Gynecological Society will begin with dinner and a social program at 6:30 p.m. Wednesday at 21 Oakknoll in Belleville. The scientific program will start at 9:30 a.m. the following day at Augustine's restaurant, also in Belleville, and will include a "Ten-Year Review of Maternal Deaths" by John Rendok, M.D., of the Illinois Department of Public Health; "Acute Renal Failure in Pregnancy" by John Garrett, M.D., associate professor of medicine, St. Louis University School of Medicine; "Secondary Amenor-rhea: New Diagnostic Tests" by Thomas F. Frawley, M.D., professor and chairman of the Department of Internal Medicine at St. Louis University, and "Biochemistry of Tumors-Diagnosis and Treatment" by Gerald Mueller, M.D., professor of oncology at the University of Wisconsin School of Medicine.

Oct. 2-6—More than 1,400 surgeons will become fellows of the American College of Surgeons during the college's 53rd Annual Clinical Congress at the Conrad Hilton Hotel, Chicago. Sessions will feature postgraduate courses, panel discussions, lectures by distinguished scientists, research reports, scientific exhibits, telecasts of surgery and medical films.

Oct. 4-5—Annual Midwest Interprofessional Seminar on Diseases Common to Animals and Man at the University of Missouri, Columbia, Mo.

Oct. 6-Tenth Annual Conference on Nutrition in Medicine, sponsored by the Mc-Lean County Medical Society, Illinois Department of Public Health, Illinois Nutrition Committee, and the Illinois State Medical Society, at Illinois House, Bloomington. Program will include "Adolescent Obesity: Treatment and Results at Seascape; a Camp for Overweight Teenage Girls" by Mrs. Penelope Peckos, Nutritionist with the Forsyth Dental Center, Boston, Mass.; "Food Out of This World" by Justin Alikonis of the Paul F. Beich Co., Bloomington; "The New Uniform Food Act" by Roy Upham, D.V.M., Illinois Department of Public Health, a panel discussion of "Home Delivered Meals" (Meals on Wheels), and "Nutritional Experiences in the National Diet-Heart Study" by Louise Mojonnier, Ph.D., Coordinator of the Coronary Prevention Evaluation Program, Chicago Health Research Foundation.

Oct. 6-7—Regional meeting of the American College of Physicians at Rivermont Holiday Inn, Memphis, Tenn. Hall S. Tacket, M.D., 910 Madison Ave., Memphis 38103, is in charge of the meeting.

Oct. 11—Third Annual Kidney Disease Symposium, sponsored by the Kidney Foundation of Illinois, at the Sheraton-Chicago Hotel.

Oct. 11—Opening lecture in the third annual "Frontiers of Medicine" series for practicing physicians, presented by the University of Chicago Hospitals and Clinics, will be on Diabetes Mellitus and Common Gynecological Problems. Series will continue on the second Wednesday of each month through May. All sessions begin at 2 p.m. in Room P-117, Billings Hospital, 950 E. 59th St., Chicago.

Oct. 14-20—The Department of Otolaryngology of the University of Illinois College of Medicine will present its Annual Otolaryngologic Assembly at the Illinois Eye and Ear Infirmary at the Medical Center, Chicago.

Oct. 16-21—"Basic and Clinical Aspects of Therapy in Advanced Cancer," postgraduate course at the University of Wisconsin Medical Center. R. J. Samp, M.D. University Hospitals, Madison, is program coordinator. Oct. 18–12th Annual Conference on Nutrition and Metabolism at the Philadelphis County Medical Society, 2100 Spring Garden St., Philadelphia, Pa.

Oct. 18-20—Columbia University College of Physicians and Surgeons, the medical school that awarded the first M.D. degrees in America, will observe its bicentennial with a three-day symposium on "Genetics and Development." More than 1,500 scientists from around the world will attend the event at the Columbia-Presbyterian Medical Center, New York.

Oct. 21-25—20th Anniversary Meeting of the American Association of Blood Banks at the Americana Hotel, New York.

Oct. 22-25—The American Rhinologic Society will present an introductory course in "Expanded Surgery of the Nasal Septum and Closely Related Structures" at Illinois Masonic Hospital, Chicago, under the direction of Maurice H. Cottle, M.D., professor of otorhinolaryngology at Chicago Medical School.

Oct. 26–13th Annual Meeting of the American Rhinologic Society at the Ambassador Hotel, Chicago. Among the subjects to be presented are "Correlating Nasal, Respiratory, Cardiovascular and Systemic Disturbances" and "Surgery and Nasal Allergy."

Oct. 29-Nov. 1—32nd Annual Convention of the American College of Gastroenterology at the Biltmore Hotel, Los Angeles, Cal.

Chicago Given \$1,036,000 to Study Population Biology

A grant of \$1,036,000 to the University of Chicago for expansion of its program in population biology over a five-year period was announced recently by the Ford Foundation.

It will enable the university to increase its faculty and students in the field of population biology, to bring visiting faculty to the university for short periods, and to begin exchange student programs with other institutions.

Population biology is the study of the growth, make-up, interaction and evolution of groups of animals and plants of different species. The general laws of population biology have important applications to world problems, such as the need for increased food production in underdeveloped countries.

Northwestern Medical School to Step Up Research and Residency Training In Anesthesiology With Grants from U.S. Public Health Service

The Northwestern University Medical School has received new grants totaling \$305,000 for research and residency training in anesthesiology from the National Institute of General Medical Sciences, U.S. Public Health Service, Bethesda, Md.

They include:

- \$250,000 for the first year of a steppedup research program in the university's department of anesthesia, including funds for doubling laboratory space in the department, for new laboratory equipment, and for research personnel. The grant is expected to continue for five years at varying levels for a total of approximately \$1,500,000 under a proposal submitted by Northwestern and approved in Bethesda.
- \$55,000 to support residency training in anesthesia for one year, in Northwestern University Medical Center hospitals.

The grants will make Chicago one of the nation's leading centers of anesthesiology research and training according to officials at the U.S. Public Health Service. They were made from funds authorized and appropriated by Congress in 1965 and 1966.

Director of both programs will be Dr. James E. Eckenhoff, professor and chairman in the Northwestern department of anesthesia. Assistant director of the research program will be Dr. Harry W. Linde, assistant professor of anesthesia. Dr. John W. Ditzler, professor of anesthesia, will serve as assistant director of the clinical training program.

Cook County Hospital, Chicago, has also received a \$15,000 residency training grant. Dr. Vincent J. Collins of Cook County Hospital, who is a Northwestern professor of anesthesia, will administer the Cook County grant.

Under the \$250,000 research grant to Northwestern, experts in anesthesia, pharmacology, cardiovascular and pulmonary medicine, and surgery will join in a broad interdisciplinary program of basic and clinical research.

One question that they will seek to answer has puzzled the medical profession since 1846, when anesthesia was introduced. It is: Exactly how do general anesthetics

work on the body to produce anesthesia—the loss of sensation and consciousness?

Today, over 120 years later, this mechanism is completely unknown, according to Dr. Eckenhoff.

Research under the Northwestern program will center on how anesthetics affect enzymes influencing nerve impulses and on how they affect cell division; on liver enzymes that act on anesthetics; on the role of vertebral veins in carrying blood away from the brain; on cardiovascular and pulmonary physiology; and on improving patient-monitoring systems for operating rooms and intensive-care units.

The \$55,000 residency training grant to Northwestern and the \$15,000 grant to Cook County Hospital are among 30 announced this week to medical schools and teaching hospitals in 21 states and Puerto Rico under a new million-dollar government program. Its aim is to upgrade the quality of training in anesthesiology and to attract more physicians to that specialty.

In addition to participating in increasingly complex surgical operations, anesthetists' duties now frequently involve such non-operating room tasks as supervision of intensive-care units, cardiac and respiratory resuscitation, inhalation therapy, and relief of chronic pain.

Trainees under the residency grants will receive \$6,500 and up per year, plus dependency allowances and annual increases. Larger amounts will go to physicians who have spent four years or more in active medical practice.

Scheduled research projects under the \$250,000 grant include:

- Effects of anesthesia on glycogen phosphorylase, an enzyme in the brain, muscle, and other organs. Dr. Edward A. Brunner, assistant professor of anesthesia.
- Effects of anesthesia on cell division and on properties of colloidal systems. Dr. David L. Bruce, assistant professor of anesthesia. (Dr. Bruce received a separate five-year National Institutes of Health postdoctoral career development award May I for his research work.)
- Protein-forming enzymes in the liver that act on anesthetics and other drugs.

Dr. Lawrence K. Berman, appointed a new assistant professor of anesthesia, will be the

principal investigator.

• Role of vertebral veins in carrying blood away from the brain. Dr. Eckenhoff will direct a research team that will study the deliberate inducement of low blood pressure and its effect on that system of veins. Team members will include Dr. Linde; Dr. Brunner; Dr. Nicholas Wetzel, associate professor of surgery; and Dr. G. E. Hale Enderby, Queen Victoria Hospital, East Grinstead, England.

• Development of more sophisticated means of monitoring patients during anesthesia and in intensive care units. Dr. Linde, principal investigator.

• Cardiovascular shock. Dr. Frank Raymon, Ir., associate in anesthesia.

In addition, the Northwestern University departments of medicine and surgery will cooperate with the research aims of the anesthesia research in projects of common interest. Performing research in cardiovascular and pulmonary physiology will be Drs. David W. Cugell, professor of medicine; Sheldon H. Steiner, associate professor of medicine; John Bergman and Louis J. Kettel, assistant professors of medicine, and Dr. Paul Hodel, research trainee.

In addition to presently planned projects, the research grant will permit Northwestern to engage full-time visiting professors of anesthesia and research associates for vary-

ing periods of research.

Research under the program will be conducted in the department of anesthesia, Montgomery Ward Building, 303 E. Chicago Ave., Chicago, and in Chicago Wesley Memorial, Passavant Memorial, and the Veterans Administration Research Hospitals, members and cooperating members of the Northwestern University Medical Center.

Ships' Surgeons Sought

Physicians in the United States may obtain free passage to Australia and New Zealand in exchange for medical services aboard ships operated by Port Line, Ltd. Both male and female doctors are eligible. Some vessels carry no passengers while others may carry as many as 12.

Interested physicians should address Mr. L. J. Eble, Port Line, Ltd., c/o Funch, Edye and Co., Inc., 25 Broadway, New York

10004.

Eli Lilly Appoints Director of Medical Research Planning



Charles N. Christensen, M.D., has been promoted by Eli Lilly and Co. to director of the medical research planning division.

A native of South Dakota, Dr. Christensen attended Huron College and the University of South Dakota School of Medicine. In 1945 he received his Doctor of Medicine degree from the University of Pennsylvania.

From 1950 to 1955 he was in private practice in Springfield, served as chief of pediatrics at Miner's Memorial Hospital in Pikeville, Ky., from 1955 until he joined Eli Lilly in 1957. As a physician in the medical division, he was responsible for handling correspondence with physicians concerning vitamin products and biologicals.

One of the country's leading candy manufacturers considers employment of the mentally retarded a wise investment. The company reports these employees have a fine attendance record and better-than-average safety record. As a general rule, retarded workers have much greater tolerance for repetitive, short cycle tasks than normal workers.

Che

HOSPITAL OF CHOICE

North Shore Hospital, a 65-year-old psychiatric facility located on Lake Michigan in Winnetka, Illinois, is an intensive care hospital.

An open staff institution, it provides, through its house and attending staff, a total range of psychotherapies and those related activities which round out a comprehensive treatment program.

A new Half Way Hall, situated in the hospital, has been opened to provide relative freedom of movement in an environment designed to stimulate recovery and provide a necessary phase of interim residence.

A completely open section is a feature of North Shore Hospital's residential plan.

An adolescent program offers boys and girls of high school age a closelystructured program of daily care, with daily classroom attendance and individual tutoring emphasized.

The adjunctive therapies are manned by certified personnel. Occupational and recreational activities not only help structure the patient's day, but offer creative programs in which patients participate according to their emotional health and native capacity.

A therapeutic education program has been introduced for all patients. Medicare patients are offered special attention and remotivation activities.

Psychiatric testing and evaluation is offered, as is individual and group therapy, chemotherapy and the traditional modalities employed in the treatment of emotional illness.

In reputation, performance and location, North Shore Hospital is the psychiatric hospital of choice.



For information, contact: CHARLES H. JONES, M.D. Superintendent & Psychiatrist in Chief Telephone: 312-446-8440 225 Sheridan Road, Winnetka, Illinois (Write for Brochure)

NEW PHARMACEUTICAL **SPECIALTIES**

by Paul deHaen

For detailed information regarding indications, dosage, contraindications and adverse reactions, refer to the manufacturer's package insert or brochure.

Single Chemicals-Drugs not previously known, including new salts.

Duplicate Single Products—Drugs marketed by

more than one manufacturer.

Combination Products-Drugs consisting of two or more active ingredients.

New Dosage Forms-Of a previously introduced product.

NEW SINGLE CHEMICALS

 \mathbf{R}

MINTEZOL Anthelmintic Manufacturer: Merck Sharp & Dohme Nonproprietary Name: Thiabendazole

Indications: Enterobiasis; intestinal parasitoses: Strongyloidiasis, Ascariasis, Uncinariasis, Trichuriasis; cutaneous larva migrans; trichinosis. Contraindications: None mentioned.

Dosage: Varies with the diagnosis, maximum recommended dose-3 Gm./day. Should be taken after meals.

Supplied: Chewable tablets-500 mg.; bottles of

DUPLICATE SINGLE PRODUCTS

DANTEN Anticonvulsant \mathbf{R} Manufacturer: McKesson Laboratories Nonproprietary Name: Diphenylhydantoin Sodium

Indications: Grand mal epilepsy and various lesser convulsive disorders other than the petit

mal group. Contraindications: Allergic phenomena such as fever and skin eruptions.

Dosage: Adults-100 to 200 mg., three times daily, with water.

Children over 6 years-100 mg. 3 to 4 times daily, with water.

Children under 4 years-30 mg. 2 to 4 times daily, with cream.

All dosages must be individualized. Supplied: Capsules-100 mg.; bottles of 100 and 1000.

DRIZE 8 & 12 Antihistamine \mathbf{R} Manufacturer: B.F. Ascher & Co.

Nonproprietary Name: Chlorpheniramine maleate Indications: Symptomatic relief of distress of allergy, as in urticaria, contact dermatitis, gastrointestinal and upper respiratory tract allergies

Contraindications: None mentioned.

Dosage: Adults and children over 12 years-one capsule morning and evening. Children 6-12 years-one Drize 8 capsule, once

or twice daily.

Not for children under 6 years. Supplied: Sustained release capsules-8 and 12 mg.; bottles of 100 and 500.

(Continued on page 360)

Forest Hospital Announces

The 1967-68 Guest Lecture Series

presenting authorities in the behavioral sciences on the theme of

THE YOUNG ADULT

October 11, 1967

Learning Problems of the Young Adult by Ralph Tyler, Ph.D., Director, Center for Advanced Study in the Behavioral Sciences, Stanford, California.

November 8, 1967

Changing Patterns of Crime: The Crime Problem in the Changing Community by Joseph D. Lohman, Dean, School of Criminology, University of California, Berkeley

January 10, 1968

The Search for Identity—Bennett Berger, Professor of Sociology, University of California, Davis

February 14, 1968

Parental Interaction and Delinquency Formation — Some Perspectives from Japan by George A. DeVos, Ph.D., Visiting Professor of Anthropology, University of Hawaii

March 13, 1968

"The Young Adult and Mental Health" by Mildred Mitchell-Bateman, M.D., Director, West Virginia Department of Mental Health, Charleston, West Virginia

April 10, 1968

Sexual Problems of the Young Adult by Albert Ellis, Ph.D., Executive Director, Institute for Rational Living, New York

June 12, 1968

Historical Perspectives on Youth by Oscar Handlin, Ph.D., Director, Charles Warren Center for Studies in American History, Harvard University

Subscriptions to the entire series of seven lectures is available for \$15.00. Admission to individual lectures is \$3.00 per person.

Guest Lecture Series Committee
Forest Hospital
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 I enclose the subscription fee of fifteen dollars (\$15) for the seven lecture series.
 Please send my subscription card to:

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U of I Hospital Appoints 33 to Straight Internships

The University of Illinois Research and Educational Hospitals, Chicago, recently announced the appointment of 33 interns and 66 new residents for the 1967-68 fiscal year.

Doctors in various levels of their residency now total approximately 215 at the Medical Center Campus in Chicago.

For the third time, the Research and Educational Hospitals will have straight internships for the coming year. Under this plan, interns will carry on their year of training in one department rather than rotating between departments. There will be 14 straight medical interns, 13 straight surgical interns, one pathology intern and five pediatric interns.

2 Illinois Physicians Given USPHS Grants for Cancer Study

Sixteen physicians have been named by the Public Health Service's National Center for Chronic Disease Control to receive senior clinical traineeship grants for advanced study in cancer control.

The grants, totaling \$162,000, were awarded by the Center's Cancer Control Program. They will enable the recipients, all of whom have completed resident training in specialty fields, to obtain an additional year's training and experience in the prevention, diagnosis and treatment, or control, of cancer.

This award brings to \$1,250,000 the total amount granted for senior clinical training in cancer control during the fiscal year ending June 30, 1967. In all, 120 physicians, already specialists in such fields as pathology, internal medicine, radiology and gynecology, received grants.

The new group of 16 physicians will train in institutions in eight States. Illinois grantees and training institutions are:

Dr. Charles E. Platz, \$10,000, University of Chicago School of Medicine, and Dr. Eugene H. Siegel, \$10,500, Presbyterian-St. Luke's Hospital, Chicago.

A recent employer attitude survey in Washington State revealed types of skills possessed were most important element on job application form. History of emotional illness ranked far below drinking problems and drug addiction as employer disqualifiers.

New Pharmaceutical Specialties

(Continued from page 358)

MENEST Hormone-Estrogen

Manufacturer: The S. E. Massengill Co.

Nonproprietary Name: Conjugated estrogens, equine.

Indications: Female-menopausal and postmenopausal syndromes; inoperable carcinoma in patients at least 5 years past menopause. Male-inoperable or advanced prostatic car-

cinoma.

Contraindications: Cancer of the breast or genitalia which might be stimulated by estrogens. Dosage: Must be adjusted to individual needs. Supplied: Tablets-1.25, 0.625 and 0.3 mg.; bottles of 100

NITROSPAN Vasodilator-Coronary
Manufacturer: USV Pharmaceutical Corp.
Nonproprietary Name: Nitroglycerin
Indications: For prophylactic use only in angina

pectoris.

Contraindications: Idiosyncrasy to nitroglycerin and/or early myocardial infarction.

Dosage: One capsule at breakfast and at bedtime, at 12 hours interval.

Supplied: Sustained-release capsules 2.5 mg.-

bottles of 100.

PROZYME Enzyme
Manufacturer: Ulmer Pharmacal Co.
Nonproprietary Name: Proteolytic enzyme
Indications: For relief of pain associated with
neuritis, Herpes Zoster and Tabes Dorsalis.
Contraindications: Previous history of allergic
reaction to foreign protein. Not for i.v. use.
Dosage: Adults-1.3 cc. i.m. daily for 2 to 5 days.
Supplied: Multiple dose vial-13 cc.

SULADRIN Eye Preparation Ranufacturer: Alcon Laboratories Nonproprietary Name: Sulfisoxazole (as the dio-

lamine salt)

Indications: Acute and chronic conjunctival infections susceptible to sulfonamide therapy and for prophylaxis to help provide a sterile field.

Contraindications: Known sulfonamide sensitivity.

Dosage: A small amount into conjunctival sac 3-4 times daily.

Supplied: Ophthalmic ointment-4%, 3.5 Gm. tubes.

COMBINATION PRODUCTS

DRIZE M Cold Preparation-General B Manufacturer: B.F. Ascher & Co.
Composition: Chlorpheniramine maleate 8 mg.
Phenylephrine HC1 20 mg.
Methscopolamine nitrate 2.5 mg.
Indications: Sinusitis, hay fever, allergic conjun-

ctivitis, allergic rhinitis, common cold.

Contraindications: Pyloric obstruction, prostatic hypertrophy, intolerance to anticholinergic or antisecretory drugs, glaucoma, hepatitus, asthma, and toxemia of pregnancy.

Dosage: Adults and children over 6 years-one consult in the morning and one of hadding

Dosage: Adults and children over 6 years-one capsule in the morning and one at bedtime. Supplied: Sustained-release capsules; bottles of 100 and 500.

(Continued on page 362)

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It provides accommodations for 100 patients in single and double rooms. Resthaven accepts patients by referral and direct admission.

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KIDNEY FOUNDATION OF ILLINOIS

Presents its

3RD ANNUAL SYMPOSIUM ON CLINICAL ADVANCES IN KIDNEY DISEASES

Sheraton-Chicago Hotel Wednesday, October 11, 1967

Guest speakers will include:

Dr. Harriet Dustan, Cleveland Clinic; Dr. Charles Kleeman, Cedars-Sinai Medical Center, Los Angeles; Dr. Robert L. Vernier, University of California at Los Angeles; Dr. Lowell King, Children's Memorial Hospital, Chicago; and Dr. Willem J. Kolff, University of Utah Medical School.

TOPICS WILL INCLUDE:

Clinical Pharmacology of Diverties
Approach to the Patient with Kidney Stones
Congenital Disorders of the Genitourinary Tract
Chronic Dialysis and Renal Transplantation
Evaluation of the Patient with Hypertension
Drug Therapy of Renal Diseases Conservative Management of Chronic Renal Failure

REGISTRATION FEE: \$15.00, including dents, Send registrations to Kidney Foundation of Illinois, 127 N. Dearborn St., Chicago, Ill. 60602.

COOK COUNTY

Graduate School of Medicine CONTINUING EDUCATION COURSES

Starting Dates-1967

SPECIALTY REVIEW COURSE IN SURGERY, Part 1, Oct. 30 SPECIALTY REVIEW COURSE IN MEDICINE, Part 1, Sept. 11 & 25 SPECIALTY REVIEW COURSE IN THORACIC SURGERY, Sept. PATHOLOGY REVIEW COURSES FOR SPECIALTIES, Request

Dates
PROCTOSCOPY & VARICOSE VEINS, One Week, September 11.
PRINCIPLES OF OPERATIVE SURGERY, Two Weeks, October

SURGERY OF THE HAND, One Week, September 18
SURGERY OF THE STOMACH, One Week, September 18
SURGERY OF FACE, MOUTH & NECK, One Week, Septem-

ber 18
BLOOD VESSEL SURGERY, One Week, October 9
VAGINAL APPROACH TO PELVIC SURGERY, One Week,
September 18
ADVANCES IN GYNECOLOGY & OBSTETRICS, One Week,
September 25
September 25
September 25
September 25
September 25

SPECIALTY REVIEW COURSE IN OB-GYN, Two Weeks, October 16

tober 16
BASIC ELECTROCARDIOGRAPHY, One Week, October 9
ADVANCES IN PEDIATRICS, One Week, September 25
PEDIATRIC SURGERY, One Week, September 25
DIAGNOSTIC RADIOLOGY, One Week, September 18
ANESTHESIA, Inhalation, Endotracheal, Regional, Request

Information concerning numerous other continuation courses available upon request.

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REGISTRAR, 707 South Wood Street, Chicago, Illinois 60612

OBITUARIES

*Dr. Neal D. Crawford, Pekin, died Aug. 1 at the age of 72. He was a member of the National Association of Railway Surgeons, the Veterans Association of the Northwestern Railroad, Cook County Hospital Alumni Association and former Secretary of Tazewell County Medical Society. *Dr. Earle Gray, Chicago, died Aug. 4

at the age of 67. He was a graduate and the last acting dean of Rush Medical Col-

*Dr. Emerson Allen Joslyn, Elmhurst, died July 20 at the age of 53. He was a member of the American Association of Railway Surgeons and Chicago Society of Industrial Medicine and Surgery. For the last 10 years he had been a member of the Congress of Delegates of the Illinois Academy of General Practice.

*Dr. Otto Kasik, retired physician for the Chicago Transit Authority, died July 26 at the age of 66. He served as a captain in the Army Medical Corps during World War II.

Dr. Walter Koch, Oak Park, died Aug. 2 at the age of 57. He was a fellow of the Royal Society of Health of England and associate professor of public health at Chicago Medical School.

*Dr. Sidney Strauss, Chicago, died July 21 at the age of 85. He was a member of the ISMS Fifty-Year Club.

*Dr. Manuel H. Turek, Lincolnwood, died July 18 at the age of 64.

Dr. Van Andrews, 74, died July 18 in Ruskin, Fla., where he had lived for the past two months. He was an oral surgeon in Cairo for 40 years.

New Pharmaceutical **Specialties**

(Continued from page 360)

NIFEREX w/VITAMIN C Hematinic/Vitamin Comb. o-t-c

Manufacturer: Central Pharmacal Co.

Composition: Iron 50 mg. Ascorbic acid 100 mg.

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Precautions: In the elderly and debilitated, and in children over six, limit to smallest effective dosage (initially 10 mg or less per day) to preclude ataxia or oversedation, increasing gradually as needed and tolerated. Not recommended in children under six. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (e.g., excitement, stimulation and acute rage) have been reported in psychiatric patients and hyperactive aggressive children. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

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Illinois Medical Journal

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ANNUAL REFERENCE ISSUE

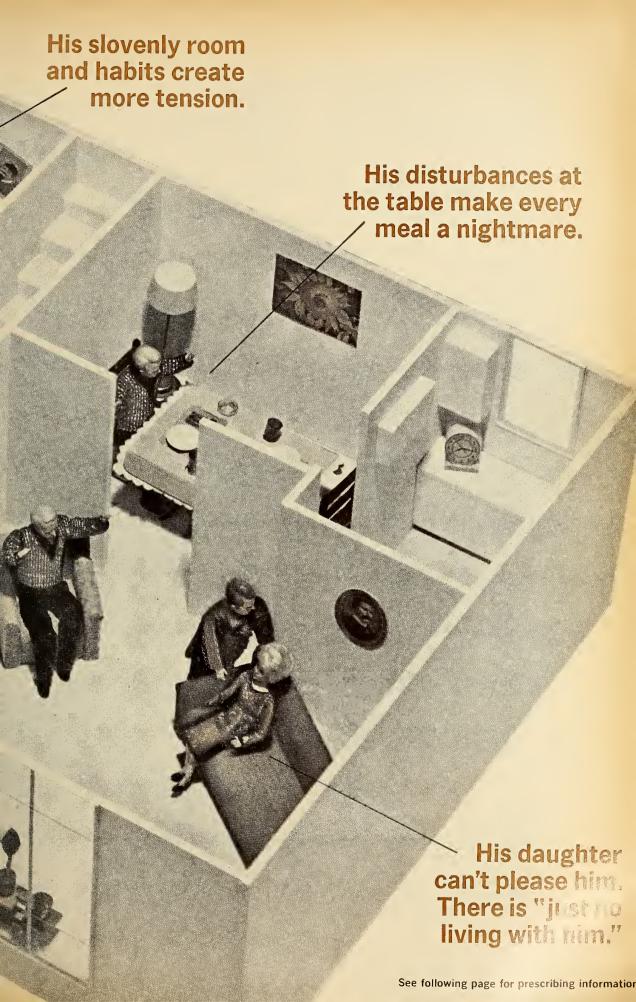
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for moderate to severe anxiety

Mellaril[®] (thioridazine) 25 mg. t.i.d.



New 'Artificial Kidney' Technique Reported

A possible important advance in the "artificial kidney" technique has been reported by the Veterans Administration.

It involves elimination of a small protruding tube in patients whose kidneys have stopped functioning and who continue to live only because their blood is purified artificially.

The tube, generally protruding from the patient's forearm, is used to draw blood from an artery, cleanse it, and return the purified blood to the body through a vein.

A team of doctors at the Bronx, N. Y., VA hospital have devised a new method which consists of surgically connecting an artery and vein under the skin's surface. This direct connection causes the vessels to enlarge and the rate of blood flow to increase, making it possible to puncture the skin with two hollow hypodermic needles to remove and then return the purified blood.

Patient Discards Dressing

At the end of the process, both needles are removed and a secure pressure bandage is applied over each puncture site. The dressings are discarded by the patient at home after several hours.

The New England Journal of Medicine editorialized recently that, "Any new alternative to the present cannula (external tube) system that promises improvement ... may represent an important step forward. The development (of the new technique) may represent the most important advance in this area since the introduction of the silicone rubber cannula system in 1962."

Dr. James E. Cimino, chief of the artificial kidney unit at the VA hospital, said 13 patients treated in the unit have had their blood cleaned by means of the new technique a total of 800 times since July 1, 1966.

The new method initially proved unsuccessful on two other patients, but once the internal opening between artery and vein was successfully established—in order to ensure continued circulation between them—doctors were able to use the puncture method.

No Incidents of Clotting

Dr. Cimino reported no incidents of clotting of the internal passageway or else-(Continued on page 613)



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Newton DuPuy, MD President

FOREWORD

In October the annual reference issue of the Illinois Medical Journal is mailed to the membership of the Illinois State Medical Society. The staff and officers have incorporated in this issue as many pertinent subjects as possible.

Suggestions have been received which resulted in careful editing, supplementary material being submitted, and those items included being changed to provide the most important data possible.

Improving the reference issue is a continuous project. Please contact the officers, trustees, or members of the headquarters staff with suggestions for the improvement of this service and for the 1968 issue.

Newton Do Pay XI. Q

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ISMS ORGANIZATION

History of Founding and Expansion

TWENTY-NINE PHYSICIANS met in Springfield June 4, 1850, to organize on a permanent basis the Illinois State Medical Society, which had been started informally 10 years earlier. The founders were concerned with the solution of ethical, scientific, legislative and economic problems. The first Constitution and Bylaws and the first Code of Medical Ethics were adopted; the first legislative committee was appointed, and a resolution outlining the beginnings of interprofessional relations was approved.

The Legislative Committee was instructed to "memorialize the legislature at its next session, praying the enactment of a statute providing for the registration of Births, Deaths and Marriages." The resolution ruled that "members of the Society will discourage the sale of patent or secret nostrums on the part of Druggists and Apothecaries throughout the State, and will patronize insofar as practicable, only those who abstain from the sale of such patent or secret nostrums."

The first full time secretary of the Society was Dr. Harold M. Camp who served for over 35 years until his death in 1958. The first executive administrator, Robert L. Richards, was employed at the time the office was moved to Chicago in 1960.

The Society published the early transactions in book form presenting not only the minutes of the House of Delegates, but also all scientific papers given at each annual convention. In 1898 a new era of communications began, for at that time, the *Illinois Medical Journal* was established and became the first "official organ of the Society."

Dr. G. N. Kreider was its first editor and served until 1913, followed by Dr. Clyde D. Pence with Dr. Henry G. Olds as the first managing editor. Dr. Charles G. Whalen became editor in 1919 and he and Dr. Olds served until they died in 1940. Dr. Camp followed Dr. Whalen and Dr. Theodore R. Van Dellen is the editor today.

Dr. Whalen spearheaded many important activities in medicine, and has been called "the outstanding champion of the medical profession in its economic contacts." He has been credited as one of the first medical editors to blast "the socialization of medicine in this country." In 1922 he wrote extensively on state medicine, workmen's compensation, compulsory health insurance, free hospitalization and federal aid.

The first Fifty Year Club in the United States was announced by the *Illinois Medical Journal* in 1938.

The fourth largest medical society in the country has developed from these embryonic beginnings. This edition of the *Illinois Medical Journal* offers you an opportunity to contrast the extensive services available to the membership today with those offered in the past.

LIST OF OFFICERS AND PLACES OF MEETING SINCE ORGANIZATION OF THE SOCIETY

	DITTOR OROAL		JI IIII SO	
YEAR	PRESIDENT	SECRETARY	Treasurer	MEETING PLACE
1840	John Todd	David Prince		Springfield
1850	Rudolph Rouse	Edwin G. Meek		Springfield
1850	William B. Herrick	Edwin G. Meek	Jno. Halderman	Springfield
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1860				
1863	A. McFarland	N. S. Davis	J. H. Hollister	Jacksonville
1864	A. H. Luce	N. S. Davis	J. H. Hollister	Chicago
1865	J. M. Steele	N. S. Davis	J. H. Hollister	Bloomington
1866	F. F. Haller	N. S. Davis	J. H. Hollister	Decatur
1867	H. Noble	N. S. Davis	J. H. Hollister	Springfield
1868	S. T. Trowbridge	N. S. Davis	J. H. Hollister	Quincy
1869	S. T. Trowbridge	T. D. Fitch	J. H. Hollister	Chicago
1870	J. V. Z. Blaney	T. D. Fitch	J. H. Hollister	Dixon
1871	G. W. Albin	T. D. Fitch	J. H. Hollister	Peoria
1872	J. O. Hamilton	T. D. Fitch	J. H. Hollister	Rock Island
1873	D. W. Young	T. D. Fitch	J. H. Hollister	Bloomington
1874	T. F. Worrell	T. D. Fitch	J. H. Hollister	Chicago
1875	J. H. Hollister	T. D. Fitch	Wm. E:Quine	Jacksonville
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1877	T. D. Fitch	N. S. Davis	J. H. Hollister	Chicago
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1888	Wm. O. Ensign	D. W. Graham	Walter Hay	Rock Island
1889	C. W. Earle	D. W. Graham	T. W. CcIlvaine	
1890		D. W. Graham	T. W. Cellvaine	Jacksonville
	John Wright	D. W. Graham		Chicago
1891	Jno. P. Mathews		Geo. N. Kreider	Springfield Vandalia
1892	Charles C. Hunt	D. W. Graham	Geo. N. Kreider Geo. N. Kreider	Vandalia
	E. Fletcher Ingals	D. W. Graham		Chicago
1894	Otho B. Will	J. B. Hamilton	Geo. N. Kreider	Decatur
1895	Daniel R. Brower	J. B. Hamilton	Geo. N. Kreider	Springfield
1896	D. W. Graham	J. B. Hamilton	Geo. N. Kreider	Ottawa
1897	A. C. Corr	J. B. Hamilton	Geo. N. Kreider	East St. Louis
1898	J. N. G. Carter	E. W. Weis	Geo. N. Kreider	Galesburg
1899	J. T. Pitner	E. W. Weis	Geo. N. Kreider	Cairo
1900	H. N. Moyer	E. W. Weis	Geo. N. Kreider	Springfield
1901	G. N. Kreider	E. W. Weis	E. J. Brown	Peoria
1902	J. T. McAnally	E. W. Weis	E. J. Brown	Quincy
1903	M. L. Harris	E. W. Weis	E. J. Brown	Chicago
1904	C. E. Black	E. W. Weis	E. J. Brown	Bloomington
1905	W. E. Quine	E. W. Weis	E. J. Brown	Rock Island
1906	H. C. Mitchell	E. W. Weis	E. J. Brown	Springfield
1907	J. F. Percy	E. W. Weis	E. J. Brown	Rockford
1908	W. L. Baum	E. W. Weis	E. J. Brown	Peoria
1909	J. W. Pettit	E. W. Weis	E. J. Brown	Quincy
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YEAR		SECRETARY	TREASURER	MEETING PLACE
1910	J. L. Wiggins	E. W. Weis	E. J. Brown	Danville
1911	A. C. Cotton	E. W. Weis	E. J. Brown	Aurora
1912	W. K. Newcomb	E. W. Weis	E. J. Brown	Springfield
1913	L. H. A. Nickerson	E. W. Weis	A. J. Markley	Peoria
1914	Charles J. Whalen	W. H. Gilmore	A. J. Markley	Decatur
1915	A. L. Brittin	W. H. Gilmore	A. J. Markley	Springfield
1916	C. W. Lillie	W. H. Gilmore	A. J. Markley	Champaign
1917	W. L. Noble	W. H. Gilmore	A. J. Markley	Bloomington
1918	E. B. Coolley	W. H. Gilmore	A. J. Markley	Springfield
1919	E. W. Fiegenbaum	W. H. Gilmore	A. J. Markley	Peoria
1920	J. W. Van Derslice	W. H. Gilmore	A. J. Markley	Rockford
1921	W. F. Grinstead	W. H. Gilmore	A. J. Markley	Springfield
1922	Charles Humiston	W. H. Gilmore	A. J. Markley	Chicago
1923	E. P. Sloan	W. D. Chapman	A. J. Markley	Decatur
1924	E. H. Ochsner	W. D. Chapman	A. J. Markley	Springfield
1925	L. C. Taylor	H. M. Camp	A. J. Markley	Quincy
1926	J. C. Krafft	H. M. Camp	A. J. Markley	Champaign
1927	Mather Pfeiffenberger	H. M. Camp	A. J. Markley	Moline
1928	G. Henry Mundt	H. M. Camp	A. J. Markley	Chicago
1929	J. E. Tuite	H. M. Camp	A. J. Markley	Peoria
1930	F. O. Fredrickson	H. M. Camp	A. J. Markley	Joliet
1931	Wm. D. Chapman	H. M. Camp	A. J. Markley	East St. Louis
1932	R. R. Ferguson	H. M. Camp	A. J. Markley	Springfield
1933	John R. Neal	H. M. Camp	A. J. Markley	Peoria
1934	Philip H. Kreuscher	H. M. Camp	A. J. Markley	Springfield
1935	Charles D. Center*	1		1 8
(Pa	st President-Elect)			
1935	Charles S. Skaggs	H. M. Camp	A. J. Markley	Rockford
1936	Chas. B. Reed	H. M. Camp	A. J. Markley	Springfield
1937	Rolland L. Green	H. M. Camp	A. J. Markley	Peoria
1938	R. K. Packard	H. M. Camp	A. J. Markley	Springfield
1939	S. E. Munson	H. M. Camp	A. J. Markley	Rockford
1940	Jas. H. Hutton	H. M. Camp	A. J. Markley	Peoria
1941	J. S. Templeton	H. M. Camp	A. J. Markley	Chicago
1942	Chas. H. Phifer	H. M. Camp	H. M. Camp	Springfield
1943	E. H. Weld	H. M. Camp	H. M. Camp	Chicago
1944	G. W. Post**	H. M. Camp	H. M. Camp	Chicago
1945	E. P. Coleman***	H. M. Camp	H. M. Camp	
1946	E. P. Coleman	H. M. Camp	H. M. Camp	Chicago
1947	R. S. Berghoff	H. M. Camp	H. M. Camp	Chicago
1948	I. H. Neece	H. M. Camp	H. M. Camp	Chicago
1949	Percy E. Hopkins	H. M. Camp	H. M. Camp	Chicago
1950	Walter Stevenson	H. M. Camp	H. M. Camp	Springfield
1951	Harry M. Hedge	H. M. Camp	H. M. Camp	Chicago
1952	C. Paul White	H. M. Camp	H. M. Camp	Chicago
1953	Leo P. A. Sweeney	H. M. Camp	H. M. Camp	Chicago
1954	Willis I. Lewis	H. M. Camp	H. M. Camp	Chicago
1955	Arkell M. Vaughn	H. M. Camp	H. M. Camp	Chicago
1956	F. Garm Norbury	H. M. Camp	H. M. Camp	Chicago
1957	F. Lee Stone	H. M. Camp	H. M. Camp	Chicago
1958	Lester S. Reavley	H. M. Camp	H. M. Camp	Chicago
1959	Raleigh C. Oldfield	H. M. Camp	H. M. Camp	Chicago
1960	Joseph T. O'Neill	George F. Lull	George F. Lull	Chicago
1961	H. Close Hesseltine	Jacob E. Reisch	Jacob E. Reisch	Chicago
1962	Edwin S. Hamilton	Jacob E. Reisch	Jacob E. Reisch	Chicago
1963	George F. Lull	Jacob E. Reisch	Jacob E. Reisch	Chicago
1964	Harlan English	Jacob E. Reisch	Jacob E. Reisch	Chicago
1965	Edward A. Piszczek	Jacob E. Reisch	Jacob E. Reisch	Chicago
1966	Burtis E. Montgomery	Jacob E. Reisch	Jacob E. Reisch	Chicago
1967	Caesar Portes	Jacob E. Reisch	Jacob E. Reisch	Chicago
1968	Newton DuPuy	Jacob E. Reisch	Jacob E. Reisch	Chicago

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^{*}Died before induction into office **Died in office. Term completed by Robert S. Berghoff, First Vice President ***Meeting cancelled 1945

Principles Of Medical Ethics

PREAMBLE: These principles are intended to aid physicians individually and collectively in maintaining a high level of ethical conduct. They are not laws but standards by which a physician may determine the propriety of his conduct in his relationship with patients, with colleagues, with members of allied professions, and with the public.

SECTION 1—The principal objective of the medical profession is to render service to humanity with full respect for the dignity of man. Physicians should merit the confidence of patients entrusted to their care, rendering to each a full measure of service and devotion.

SECTION 2—Physicians should strive continually to improve medical knowledge and skill, and should make available to their patients and colleagues the benefits of their professional attainments.

SECTION 3—A physician should practice a method of healing founded on a scientific basis; and he should not voluntarily associate professionally with anyone who violates this principle.

SECTION 4—The medical profession should safeguard the public and itself against physicians deficient in moral character or professional competence. Physicians should observe all laws, uphold the dignity and honor of the profession and accept its self-imposed disciplines. They should expose, without hesitation, illegal or unethical conduct of fellow members of the profession.

SECTION 5—A physician may choose whom he will serve. In an emergency, however, he should render service to the best of his ability. Having undertaken the care of a patient, he may not neglect him; and unless he has been discharged he may discontinue his services only after giving

adequate notice. He should not solicit patients.

SECTION 6—A physician should not dispose of his services under terms or conditions which tend to interfere with or impair the free and complete exercise of his medical judgment and skill or tend to cause a deterioration of the quality of medical care.

SECTION 7—In the practice of medicine a physician should limit the source of his professional income to medical services actually rendered by him, or under his supervision, to his patients. His fee should be commensurate with the services rendered and the patient's ability to pay. He should neither pay nor receive a commission for referral of patients. Drugs, remedies or appliances may be dispensed or supplied by the physician provided it is in the best interests of the patient.

SECTION 8—A physician should seek consultation upon request; in doubtful or difficult cases; or whenever it appears that the quality of medical service may be enhanced thereby.

Section 9—A physician may not reveal the confidences entrusted to him in the course of medical attendance, or the deficiencies he may observe in the character of patients, unless he is required to do so by law or unless it becomes necessary in order to protect the welfare of the individual or of the community.

SECTION 10—The honored ideals of the medical profession imply that the responsibilities of the physician extend not only to the individual, but also to society where these responsibilities deserve his interest and participation in activities which have the purpose of improving both the health and the well-being of the individual and the community.

Constitution And Bylaws May 1967

Adopted, 1903 As Amended, 1967

CONSTITUTION

ARTICLE I. NAME

The name and title of this organization shall be the Illinois State Medical Society.

ARTICLE II. PURPOSES OF THE SOCIETY The purposes of this Society are to promote the science and art of medicine, to protect the public health, to elevate the standards of medical education and to unite the medical profession behind these purposes; to promote similar interests in the component societies and to unite with similar organizations in other states and territories of the United States to form the American Medical Association. The Society shall inform the public and the profession concerning the advancements in medical science and the advantages of proper medical care.

ARTICLE III. COMPONENT SOCIETIES Component societies shall consist of those county medical societies which hold charters from this Society.

ARTICLE IV. COMPOSITION OF THE SOCIETY

The Society shall consist of active members and such other members as the Bylaws may provide.

ARTICLE V. HOUSE OF DELEGATES
Section 1. The House of Delegates shall be the
legislative body of the Illinois State Medical
Society, and unless otherwise herein provided, its
deliberations shall be binding upon the officers,
including the Board of Trustees. The House of
Delegates shall set the basic policy and philosophy
of the Society.

Section 2. The House of Delegates shall elect the general officers, except as otherwise provided in the Bylaws.

ARTICLE VI. BOARD OF TRUSTEES

The Board of Trustees, whose duties are executive and judicial, shall have charge of all property and all financial affairs of the Society, and shall perform such other duties as are prescribed by law governing the directors of corporations, or as may be prescribed in the Bylaws.

ARTICLE VII. CONVENTIONS AND MEETINGS

The Society shall hold an annual convention during which there shall be a business meeting of the House of Delegates and general scientific meetings which shall be open to all registered members.

ARTICLE VIII. OFFICERS

The officers of this Society shall be a president, a president-elect, a first vice president, a second vice president, a secretary-treasurer, a speaker and vice speaker of the House of Delegates, sixteen trustees and one trustee at large, and such other officers as the Bylaws may provide.

ARTICLE IX. THE SEAL

This Society shall have a common seal with power to break, change or renew the same when necessary.

ARTICLE X. AMENDMENTS

The House of Delegates may amend this Constitution at any annual business meeting of the House of Delegates provided that the amendment shall have been proposed at the preceding annual business meeting, and that two-thirds of the members of the House of Delegates seated concur in the amendment.

BYLAWS

CHAPTER I. MEMBERSHIP

Section 1. Members.

A. Active Members. The active members of this Society shall consist of regular members, emeritus members, retired members, provisional members, intern members and residency members. Active members shall enjoy full privileges which include membership in the American Medical Association.

- B. Special Members. The special members of this Society shall be distinguished because of their contributions to the science and art of medicine.
 - (1) Distinguished Members. Distinguished members shall be:
 - a. Physicians of Illinois or other states, or foreign countries who have risen to prominence in the profession; or

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- b. Teachers of medicine or of the sciences allied to medicine, not eligible for active membership; or
- Members of associated arts or sciences who have made significant contributions to medicine.
- (2) Election. Special members may be nominated by any member of the House of Delegates, and may be elected by the House at any annual convention by a two-thirds vote.
- (3) Privileges. Special members shall not be entitled to hold office nor to vote, and shall not be considered as members in determining the number of delegates to the American Medical Association, but they may participate in all other Society activities.

Section 2. Qualifications for Membership.

- A. Every physician duly licensed and registered in the State of Illinois to practice medicine in all its branches who is a graduate of a medical school approved in United States or Canada, a resident of the State of Illinois, a citizen of the United States, who is of good moral character and professional standing, and a member of his component medical society, shall be eligible for regular membership.
- B. Provisional membership shall be available to any Illinois physician who has made a declaration of intention to become a citizen of the United States, who has received a license in this State to practice medicine in all of its branches, and who-with the exception of United States citizenship—possesses all of the qualifications for membership prescribed by these Bylaws. Provisional membership shall terminate one year after the expiration of the minimum period of time within which such member could have perfected his citizenship. After obtaining full citizenship and prior to the expiration of his provisional membership, such member may be, upon application to his component medical society, transferred to regular membership.
- C. The following shall also be eligible if approved and recommended by the component medical society:
 - Every physician serving as a full time employee at the headquarters of the American Medical Association;
 - (2) Physicians serving as medical officers in the United States Governmental Services, who are members of a component society, so long as they are engaged actively in their respective service, and thereafter, if they have been retired on account of age or physical disability, or after long and honorable

service under the provision of an Act of Congress;

D. Physicians otherwise eligible for membership, and licensed in one of the States of the Union, but not licensed in Illinois, and who are not engaged in the active practice of medicine, but otherwise employed in an allied medical activity which does not require licensure, shall be eligible for membership if approved and recommended by the component medical society and approved by the Board of Trustees.

Section 3. Emeritus Members. A member who has been in good standing for thirty-five years and who has reached the age of seventy, may upon application to and upon recommendation of his component society, be made an emeritus member and have all the rights and privileges of membership without the payment of dues to the component or state society.

Credit for membership in other American Medical Association constituent societies shall be accorded transferees, provided they have been members of this Society for at least five years.

Section 4. Retired Members. A member who has been in good standing but who by reason of age or incapacity, has retired from active practice, may upon application to and upon recommendation of his component society, be made a retired member, without payment of dues to the component or state society.

Section 5. Intern Members. Any person who is a graduate of a medical school approved in the United States or Canada, who is of good moral character and professional standing and who is serving an internship in any hospital in the State of Illinois, approved by the American Medical Association, is eligible for intern membership upon the recommendation of any two members of this Society who are also members of his hospital staff.

The physician's intern membership shall cease at the end of the year in which his internship training terminates, and if he wishes to become a member of this Society, he must apply for a residency or regular membership through his component society.

Dues for intern membership shall be minimal.

Section 6. Residency Members. After being licensed to practice medicine, a physician serving full time as a resident in a residency approved by the American Medical Association, is eligible for full membership.

Dues for residency members shall be minimal. A residency member must be a graduate of a medical school approved in the United States or Canada, have a degree of Doctor of Medicine or its equivalent, and must be a member in good standing of his component society.

The physician's residency membership shall cease at the end of the year in which his residency training terminates, and if he wishes to become a member of this Society, he must apply for regular membership through his component society.

Section 7. Tenure of Membership. The name of a physician on the properly certified roster of members of a component society which has paid its annual assessments, shall be prima facie evidence of membership in this Society, and afford all the rights and privileges pertaining thereto.

Section 8. Withdrawal of Privileges. No person who is under sentence of suspension or expulsion from a component society, shall be entitled to any of the rights or benefits of this Society, nor shall he be permitted to take part in any of the proceedings until he has been reinstated.

CHAPTER II. ANNUAL CONVENTIONS Section 1. Date. The Board of Trustees shall determine the date for the annual convention.

Section 2. Meeting Place. The meeting place for the annual convention shall be determined by the House of Delegates from a list of cities extending invitations, subject to investigation of the facilities and approval by the Board of Trustees.

Section 3. Scientific Meetings.

- A. With the consent of the House of Delegates or the Board of Trustees any special group may conduct its meeting in connection with the annual convention of this Society.
- B. For the transaction of scientific business, there shall be one or more sections as may be determined from year to year by the Board of Trustees.
- C. Section officers shall be appointed by the president of the Society from nominees recommended by the section, or if there are no nominees, from a list submitted by the chairman of the Committee on Scientific Assembly.
- D. The officers of the sections shall arrange the scientific program for the section in cooperation with the Committee on Scientific Assembly.
- E. All registered members may attend and participate in the proceedings and discussions of the general scientific meetings and of the section meetings.
- F. The general scientific meetings may recommend to the House of Delegates the appointment of committees or commissions for scientific investigation of special interest and importance to the profession and to the public.
- G. All papers read before the Society or any section thereof, shall become the property of the Society. Each paper shall be deposited with the secretary when read, and presentation of a paper to the Illinois State Medical Society shall be considered tantamount to the assurance on the part of the writer that such

paper has not already been published.

H. The Board of Trustees shall be entirely responsible for the annual convention.

CHAPTER III. THE HOUSE OF DELEGATES

Section 1. Composition. The voting membership of the House of Delegates shall consist of:

- (1) Delegates elected by the component societies
- (2) The president
- (3) The president-elect
- (4) The secretary-treasurer
- (5) The speaker of the House (or the vice speaker when presiding) and
- (6) The trustees.

Non-voting members shall be the vice presidents, the vice speaker (when not presiding), the past trustees, past speakers, past presidents, general officers of the AMA and delegates from the Illinois State Medical Society to the AMA.

Section 2. Meetings. The House of Delegates shall meet at the time and place of the annual convention of the Society, and shall fix its hours of meeting so that they shall not conflict with the general scientific meetings of the Society. If the interests of the Society and the profession require, the House of Delegates may meet in advance of the general scientific meetings.

Section 3. Quorum. Fifty delegates representing not less than twenty component societies shall constitute a quorum for the transaction of business.

Section 4. Special Meetings. Special meetings of the House of Delegates may be called by the president or a majority of the Board of Trustees, or shall be called on petition of twenty component societies.

When a special meeting is thus called, the secretary shall mail a notice to the last known address of each member of the House of Delegates at least ten days before the special meeting is to be held. The notice shall specify the time and place of the meeting and the purpose for which the meeting is called. The meeting shall not consider any business except that for which it was called.

Section 5. *Delegates*. Each component society shall be entitled to send to the House of Delegates each year, one delegate for each 75 members, and one for a major fraction thereof; but each component society which has made its annual report and paid its assessment as provided for in this Constitution and Bylaws, shall be entitled to one delegate.

The number of delegates to which any component society is entitled shall be determined by the number of active members of the component society on the membership rolls of the Illinois State Medical Society as of December 31 of the preceding year.

The term of office of a delegate shall begin January 1 following his election, and shall be for

two years, or until his successor has been elected. Component societies with one delegate only, may elect for one year.

Section 6. Registration. Before being seated at any annual or special session, each delegate or his alternate shall deposit with the Reference Committee on Credentials a certificate signed by the president and/or the secretary of the component society, stating that the delegate or alternate has been regularly elected to the House of Delegates.

A delegate or his alternate may be seated without credentials, provided he is properly identified by his county society and so certified to the secretary of the Illinois State Medical Society.

When a delegate and his alternate are unable to attend a specified meeting, the appropriate authorities of the component society concerned may appoint a substitute delegate and a substitute alternate who on presenting proper credentials, shall be eligible to regular membership in the House of Delegates.

A delegate whose credentials have been accepted by the Reference Committee on Credentials and whose name has been placed on the roll of the House, shall remain a delegate until final adjournment of that meeting. If a delegate, once seated, is unable to be present for reasons acceptable to the Committee on Credentials, an alternate may be certified by that Committee. After the alternate has been seated, he cannot be replaced.

Section 7. AMA Delegates and Alternate Delegates. The House of Delegates shall elect representatives to the House of Delegates of the American Medical Association in accordance with the Constitution and Bylaws of that body.

Section 8. District Divisions. The House of Delegates shall divide the state into districts, specifying which counties each district shall include.

Section 9. Committees. The House of Delegates may authorize the appointment of ad hoc committees by the president, who shall first consult with the president-elect.

The president shall have authority to designate to serve on ad hoc committees, members of the Society who are not members of the House and who may be present and permitted to participate in the debate when the report of the committee is considered.

CHAPTER IV. ELECTION OF OFFICERS Section 1. Officers. The officers of this Society shall consist of the president, president-elect, first and second vice presidents. secretary-treasurer, speaker and vice speaker, sixteen trustees and one trustee-at-large.

Section 2. *Elections*. All elections shall be by ballot except when there is only one candidate for a given office, then election may be by voice vote.

The majority of votes cast shall be necessary to elect.

The election of officers, delegates and alternate delegates to the AMA, shall follow the completion of action on current and old business at the final session of the House of Delegates.

Section 3. Terms of Office. The president-elect, vice presidents, sccretary-treasurer, the speaker and vice speaker shall be elected annually by the House of Delegates to serve for a term of one year.

Members of the Board of Trustees shall be elected by the House of Delegates to serve for a term of three years.

The speaker and vice speaker shall not be elected for more than three consecutive terms to their respective offices; they shall be elected from the membership of the House of Delegates.

The president- elect shall be inducted into the office of president by the retiring president during the final session of the House of Delegates. After assuming office at the adjournment of the annual business meeting, he shall continue in office until his successor has been elected and installed. Following his retirement as president, he shall automatically become a trustee-at-large for a term of one year.

CHAPTER V. DUTIES OF OFFICERS

Section 1. The President. The president of the Illinois State Medical Society shall lead the Society in all its functions. He shall deliver an annual address at such time as may be arranged, and perform such other duties as custom and parliamentary usage may require.

The president shall appoint the ad hoc committees of the House of Delegates. He may seek the advice of the officers and trustees.

He shall preside at the general scientific meetings of the Society or designate one of the vice presidents to substitute for him.

Section 2. The Vice Presidents. The vice presidents shall act for and perform such duties for the president as he shall direct. They shall, when so acting, implement and advance the programs and policies of the president.

In the event of the president's death, resignation or removal from office, the first vice president shall succeed to the presidency.

In the event of a vacancy in the office of first vice president, the president shall fill the office by appointment.

Section 3. Successor to President-Elect. In the case of death, resignation, or removal from office of the president-elect, the office shall be filled by the House of Delegates at the next annual convention by election at a time recommended by the Reference Committee on Rules and Order of Business.

Section 4. *The Speaker*. The speaker, who shall be versed in parliamentary procedure, shall preside at

the meetings of the House of Delegates and shall perform such duties as custom and parliamentary usage require.

He shall appoint the reference committees.

He shall be an ex-officio member of the Committee on Constitution and Bylaws.

Section 5. The Vice Speaker. The vice speaker shall preside for the speaker in the latter's absence or at his request. In case of death, resignation or inability of the speaker to perform his duties, the vice-speaker shall serve during the unexpired term.

Section 6. The Secretary-Treasurer. In addition to the rights and duties ordinarily devolving on the secretary of a corporation by law, custom or parliamentary usage, and those granted or imposed in other provisions of the Constitution and these Bylaws, the secretary-treasurer shall be the official custodian of all securities and the income therefrom, owned by the Society, subject to the direction and disposition of the Board of Trustees. He shall be a member of the Finance Committee of the Board of Trustees.

The Board of Trustees may select a bank or trust company to act as custodian in the place of the secretary-treasurer, of all or any part of such securities and to act as agent of the Society in collecting the income therefrom.

The secretary-treasurer shall give bond in such sum as may be fixed by the Board of Trustees, the premium on such bond to be paid by the Society. He shall perform such other duties as may be directed by the House of Delegates or by the Board of Trustees.

In the event of a vacancy in the office of the secretary-treasurer, the Board of Trustees shall fill the vacancy until the next annual election.

CHAPTER VI. THE BOARD OF TRUSTEES Section 1. Composition. The Board of Trustees shall consist of sixteen trustees elected by the House of Delegates [six shall be chosen from district number three, and one from each of the other ten districts (see map attached), these districts of the geographical area as of May, 1946], and one trustee-at-large (the retiring president, who shall serve a term of one year), the president, the president-elect, the speaker and secretary-treasurer.

The vice presidents and vice speakers shall attend the meetings (including executive sessions), with the right of discussion, but without the right to vote.

Section 2. The duties of the Board of Trustees are executive, custodial and judicial.

A. Executive Duties. The Board of Trustees shall implement all mandates from the House of Delegates excepts in matters of property or finance when it shall have sole authority.

The Board of Trustees may request a report from any committee in the interim between meetings of the House of Delegates. B. Custodial Duties. The Board of Trustees shall have charge and control of all property of whatsoever nature belonging to the Society, and of all funds from whatsoever source belonging to the Society.

No person shall expend or use for any purpose money belonging to the Society without the approval of the Board of Trustees.

All money received by the Board of Trustees and its agents, resulting from the duties assigned them, shall be paid into the treasury of the Society, and all orders on the treasury for disbursements of money shall be approved by the Board.

The Board of Trustees shall formulate rules governing the expenditure of money to meet the necessary running expenses and fixed charges of the Society.

All acts of the House of Delegates involving the expenditure, appropriation or use in any manner of money, or the acquisition or disposal in any manner of property of any kind belonging to the Society, must be approved by the Board of Trustees before same shall become effective.

Funds may be appropriated to encourage scientific investigation, medical education or any other purpose deemed proper and approved by the Board of Trustees.

C. Judicial Duties. The Board of Trustees shall be the board of censors of the Society. It shall have jurisdiction over all questions of ethics and in the interpretation of the laws of the Society. It shall consider all questions involving the rights and standing of members, whether in relation to other members, to component societies, or to this Society.

All questions of an ethical nature before the House of Delegates or the general scientific meetings, shall be referred to the Board of Trustees without discussion. The Board shall hear and decide all questions of procedure affecting the conduct of members on which an appeal is taken from the decision of a component society.

The decision of the Board of Trustees shall be final except that an appeal may be taken by a member charged with misconduct as provided for in the Constitution and Bylaws of the American Medical Association.

Section 3. Executive Administrator. The Board of Trustees shall employ an executive administrator whose duties shall be determined by the Board. He shall be responsible to the chairman of the Board. The Board shall review at each of its meetings the interim activities of the administrator. The Board shall also employ such other people as are needed for the conduct of the affairs of the Society.

Section 4. Meetings. The Board of Trustees shall meet daily during the annual convention of the Society, and at such other times as necessity may

require, subject to the call of the chairman, or on the petition of the majority of the Trustees.

Section 5. Organization.

- A. Chairman. The Board of Trustees shall meet on the last day of the annual convention and elect from among its members a chairman. He shall hold office for one year and may succeed himself for one additional year.
- B. Duties of the Chairman. The chairman of the Board of Trustees shall prepare an agenda and shall preside at all meetings of the Board. He shall make an annual report to the House of Delegates. He shall be chairman of the Executive Committee. He shall present the report of the actions of the Executive Committee to the Board.
- C. Committees. The Board shall form the following committees within itself:
 - (1) Executive Committee
 - (2) Finance Committee
 - (3) Policy Committee
 - (4) Committee on Committees
 - (5) Committee on Constitution and By-
 - (6) Journal Committee
 - (7) Advisory Committee to Woman's Auxiliary
 - (8) Such other committees as are deemed necessary
- D. Duties of the Committees.
 - (1) Executive Committee. The Executive Committee shall consist of the president, the president-elect, the chairman of the Board, the chairman of the Finance Committee, the chairman of the Policy Committee, the secretary-treasurer and the trustee-at-large.

It may be given authority to act by the Board of Trustees.

In matters of routine administration, special plans, policy, endorsement or expenditure it shall report to and request approval of the Board. It shall receive the reports of the Finance and Policy Committees and make recommendations concerning them to the Board. It shall furnish a report of its actions to the Board at each meeting.

(2) Finance Committee. The Finance Committee shall consist of the secretary-treasurer of the Society and three members of the Board appointed by the chairman. It shall develop for approval of the Board through the Executive Committee, a budget for the fiscal year. It shall supervise the financial transactions of the Society. It shall make recommendations to the Board for the control and investment of the funds of the Illinois State Medical Society.

The Medical Benevolence Committee shall be a subcommittee of the Finance Committee.

It shall:

- a). Examine applications to the Society for assistance to determine eligibility for assistance.
- b). Keep the names of the beneficiaries confidential and known only to the committee.
- c). Recommend to the Finance Committee the allotment for each recipient, and
- d). If funds available become inadequate to meet disbursements, request the Board of Trustees to appropriate sufficient funds to support the program until the next budget appropriation.
- (3) Policy Committee. The Policy Committee shall consist of three members of the Board appointed by the chairman. It shall continually review past and current proceedings of the House of Delegates to determine the established policies of the Illinois State Medical Society.
- (4) The Committee on Committees. The Committee on Committees shall review annually the purpose, activity and structure of all committees, and shall recommend such changes in existing committees or propose such additional committees as appear to be required for the efficient conduct of the business of the Society.

The activities of the Committee on Committees shall be reviewed by the Executive Committee and approved by the Board of Trustees.

- (5) The Committee on Constitution and Bylaws. The Committee on Constitution and Bylaws shall
 - a). Receive from individual members, county societies, committees, the Board of Trustees, and the House of Delegates, all suggestions and proposals for modification of the Constitution and Bylaws.
 - b). Prepare for the consideration of the House of Delegates, all changes in the Constitution and Bylaws, and
 - c). Maintain constant surveillance of both documents to keep them current, effective and consistent with the policies of the House of Delegates.
- (6) The Journal Committee. The Journal Committee shall be composed of mem-

bers of the Board of Trustees, and shall be responsible for the production of the Illinois Medical Journal.

It shall recommend to the Board of Trustees all policies governing the editorial, business and production aspects of the Journal. It shall supervise the editor in the selection and preparation of all copy, and it shall establish standards for the editorial content.

It shall establish advertising policies, rates, standards, and shall review all new accounts prior to acceptance, and shall approve reprint and circulation policies.

It shall conduct a periodic review of the printer's contract and solicit bids as indicated. It shall establish the forformat, cover, type faces and general layout of the Journal.

(7) Advisory Committee to the Woman's Auxiliary. The Advisory Committee to the Women's Auxiliary shall consist of the president elect as chairman, the president and the chairman of the Board of Trustees.

The Committee shall provide advice and assistance to the president of the Woman's Auxiliary in her program for the year, and shall assist her in interpreting the activities of the Illinois State Medical Society.

Section 6. Quorum. Ten members of the Board of Trustees shall constitute a quorum for the transaction of business.

Section 7. County Societies. The Board of Trustees shall have authority to organize the physicians of two or more counties into societies to be suitably designated, and these societies, when organized and chartered, shall be entitled to all rights and privileges provided for component societies until such counties shall be organized separately.

Section 8. Publications. The Board of Trustees shall provide and superintend the publication and the distribution of all proceedings, transactions and memoirs of the Society, and shall have authority to appoint an editor and such assistants as it deems necessary.

Section 9. Bonding. The Board of Trustees shall provide at the expense of the Society, adequate bond for those officers and employees of the Society it considers require bonding.

Section 10. Duties of Trustees. Each trustee shall be the organizer, consultant, advisor, administrator and speaker for the members of his district, and represent the Society as well as the members of his district at the Board meetings.

Each trustee should visit the societies in his district at least once a year. He shall make an annual report of his work and the condition of the profession in each society in his district to the Board of Trustees and to the House of Delegates.

Where his district is composed of more than one county, the trustee shall be an ex-officio member of the district Ethical Relations Committee, Grievance Committee, and Prepayment Plans and Organizations Committee. He shall report to the Board of Trustees the actions of the component societies on reports of these committees.

The necessary traveling expenses incurred by such trustee in the line of the duties herein imposed, may be allowed by the Board of Trustees upon presentation of a properly itemized statement.

Section 11. Vacancies. If during the interval between two annual conventions, sickness, death, or removal from the state or district, or any other reason prevents a trustee from attending the duties of his district, or if he shall be absent from two consecutive meetings of the Board, his office may be declared vacant at the discretion of the Board. The Board shall have the authority to fill the vacancy for the period between the date at which the office was declared vacant and the next annual meeting of the House of Delegates.

Section 12. The Benevolence Fund. Each year the Board shall appropriate from the funds of this Society such sum or sums as it may deem proper to be held in a fund to be known as "The Benevolence Fund." This fund is established and shall be used only for the assistance or relief of needy members of this Society, their widows, widowers, or minor children. The assets shall be held in the treasury of this Society in a separate fund. Donations or bequests to the Benevolence Fund automatically become a part of these assets.

Section 13. Audit and Financial Statement. The Board of Trustees shall employ annually a certified public accountant to audit all accounts of the Society, and present a statement of same in its annual report to the House of Delegates.

This report shall also specify the character and cost of all publications of the Society during the year, and the amount of all other property belonging to the Society under its control, with such suggestions as it may deem necessary.

CHAPTER VII. DISTRICT COMMITTEES

Each trustee district which is composed of more than one county, shall have an Ethical Relations Committee, a Grievance Committee, a Committee on Prepayment Plans and Organizations, and such other committees as required to provide to each component society, those services the component society may not be able to provide for itself. District committees shall function only at the request of a component society within the district.

Complaints initially received by district committees shall be referred immediately to the component society for action.

District committees shall be governed by the procedural rules and regulations governing the counterpart state society committee or by these Bylaws.

Reports of findings and recommendations of these district committees shall be made to the component society which requested action.

The district trustee shall include a summary of the activities of each of these committees and the findings in general, in his annual report to the House of Delegates.

The committee members shall be elected, subject to the general rules on composition of committees contained in Section 5, Chapter IX, of these Bylaws, at a meeting of the delegates of the district called by the trustee of the district, before or during the annual convention of the Illinois State Medical Society. Chairmen of the committees shall be designated by the trustee of the district, and the trustee shall be an ex-officio member of each committee.

CHAPTER VIII. DUES AND EXPENSES

Section 1. Annual Dues. Assessments may be levied by the House of Delegates on each component society on a proportional basis. The amount of the dues shall be fixed by the House of Delegates and shall include the dues and/or assessments approved by the House of Delegates of the American Medical Association.

These annual dues shall include the annual subscription to the Illinois Medical Journal which shall be at least fifty per cent of the regular subscription price of the Journal.

Section 2. The Board of Trustees upon recommendation of the component society, shall give 50% reduction in dues to teaching, research and administrative personnel in full time employment in the approved medical schools in Illinois, or similar not-for-profit institutions in Illinois.

Section 3. Physicians in private practice of medicine may be given a 50% reduction in dues during the first year of practice upon recommendation of their component society.

Section 4. Physicians approved for membership after June 30 shall pay one-half of the annual dues for that year.

Section 5. The Board of Trustees may authorize the remission of dues of any member on recommendation of his component society for good reason. In such cases the secretary shall recommend remission of dues by the American Medical Association.

CHAPTER IX. COMMITTEES

Section 1. Committees of the Illinois State Medical Society. The committees of the Illinois State Medical Society shall be:

- A. Standing committees called Councils
- B. Reference committees
- C. Ad hoc committees
- D. Board of Trustees committees

Section 2. Standing Committees-Called Councils.

The standing committees of the Society shall be:

- A. The Judicial Council
- B. The Medical Legal Council
- C. The Council on Third Party Medicine
- D. The Council on Public Relations
- E. The Council on Medical Education
- F. The Council on Medical Service and such other Councils as shall be established from time to time by the Board of Trustees.

Section 3. Organization of Councils.

- A. Councils shall be appointed by the Board of Trustees.
- B. The chairman of a Council shall be designated by the Board.
- C. Each Council shall have authority to request the Board of Trustees to appoint sub-committees for any purpose within the functions of the Council. A member of the Council shall be designated as chairman of the subcommittee.
- D. These sub-committees may also request the Board to appoint special committees for any purpose relating to the general functions of the sub-committee. A member of the sub-committee shall chair the special committee.
- E. Only active members of the Illinois State Medical Society, not American Medical Association delegates nor those holding elective office in the Illinois State Medical Society, may be appointed to a Council. Any active member of the State Society may be a member of a sub committee or a special committee. Elective officers may be appointed advisors to any committee.

Recommendations for membership on any committee may be submitted to the Board of Trustees by the House of Delegates, or in writing by any member of the Society.

A state committee which reviews the decisions of a similar committee of a component society may not have as a member one who currently serves on the same committee of a component society or district.

- F. Each Council, sub-committee or special committee shall have authority to make rules to govern its procedures subject to:
 - Specific requirements of the Constitution and Bylaws and the policies of the House of Delegates, and
 - 2). Approval of the Board of Trustees.

- G. Each Council shall submit for adoption, a budget for the ensuing year, and the Board of Trustees shall determine the appropriation for each Council. Requests for additional funds must be approved by the Board before they are committed.
- H. The president of the Society, the speaker of the House and the chairman of the Board shall be ex-officio members of the various Councils, and may attend all committee meetings.
- Each Council shall have members in sufficient quantity so that each sub-committee may be chaired by a different member.
- J. Terms of office of members of the Councils shall not be more than three years, but may be terminated for cause at any time at the discretion of the Board. No member of a Council shall serve more than three consecutive terms. Service of two or more years in an unexpired term shall be considered a full term.

K. Reports.

- Special committee reports shall be made by the chairman to the subcommittee from which he was appointed.
- Reports from sub-committees (which shall contain summaries of the report of special committees) shall be made by the chairman to the Council of which he is a member.
- Reports of Council activities shall include recommendations on reports and requests from sub-committees, and shall be made to the Board of Trustees by the chairman of the Council.
- The chairman of the Council with the approval of the Board, may permit any member of a committee under the Council to clarify the report of that committee to the Board.
- The chairman of any committee may request the Board of Trustees to allow him, or any member of his committee, to appear before the Board.
- All committees shall submit to the House of Delegates, written reports summarizing all actions, and may include recommendations for House consideration.
- L. Vacancies on any committee may be filled at any time by the Board of Trustees. Committee membership may be enlarged or decreased or the committee may be discharged by the Board of Trustees.

M. Committee Meetings

The chairman of a committee, when he considers it expedient and with the consent of two thirds of the members of the committee, may conduct business or hold meetings by

mail or by conference call, provided all members of the committee are given opportunity to participate, that minutes of the transactions are recorded, approved by members participating, and circulated among all committee members.

Section 4. Duties

A. The Judicial Council

The Judicial Council shall be authorized by the Board of Trustees to:

- 1). Act as the Ethical Relations Committee of the Society.
- 2). Investigate
 - (a) Controversies arising under this Constitution and Bylaws and under the principles of medical ethics, to which the Society is a party, and
 - (b) Controversies between two or more county societies and their members.
- Investigate all questions of medical ethics and the interpretation of the Constitution, Bylaws and Policies of the Society.
- Investigate general professional conditions and all matters pertaining to the relations of physicians to one another or to the public.
- 5). To receive appeals filed by applicants who alleged that they have been denied membership in a component society because of race, creed, color, or ethnic origin, to determine the facts of the case and to report the findings to the Board of Trustees.

B. The Medical Legal Council

The Medical Legal Council shall:

- 1). Educate the members of the profession in all medico-legal affairs, and
- 2). Co-operate with the AMA in its program in these same fields.

C. The Council on Public Relations

The Council on Public Relations shall plan and execute programs designed to enhance the relationship between the public and the medical profession.

D. The Council on Medical Education

The Council on Medical Education shall:

- Study and evaluate all phases of medical education including the development of programs approved by the House of Delegates for the provision of a continuing supply of well-qualified physicians;
- Study and evaluate education relating to the health professions and services important to medicine, including the development of programs approved by the House of Delegates, for the provision of a continuing supply of wellqualified personnel in these fields;

- Carry to the deans of the medical schools recommendations from the viewpoint of the practicing physician;
- Study, evaluate and criticize the postgraduate programs of the Society and other organizations, and
- Be available to advise and cooperate with the Department of Registration and Education of the State of Illinois.

E. The Council on Third Party Medicine

The Council on Third Party Medicine shall review and adjust differences between members of the Society and prepayment plans and/or insurance organizations (including federal and state governmental programs), except those otherwise served by special advisory committees.

In disputes brought by third parties against physicians, the committee shall act only upon referral or appeal from county or district committees.

F. The Council on Medical Service

The Council on Medical Service shall:

- Make available facts, data and opinions with respect to timely and adequate rendition of medical care to the residents of Illinois;
- 2). Inform component societies of proposed changes affecting medical care,
- 3). Inform component societies regarding the activities of the Council, and
- Study and suggest means for the distribution of medical services to the public consistent with the principles and policies adopted by the House of Delegates.

Section 5. Reference Committees

Reference Committees shall be appointed by the speaker of the House of Delegates as outlined in Chapter X. REFERENCE COM-MITTEES, and as provided therein.

Section 6. Ad hoc Committees

- A. Ad hoc committees shall be appointed by the speaker of the House of Delegates to accomplish specific duties.
- B. Any member of the Society may be asked to serve.
- C. The terms of appointment shall be for the duration of the task, or until the committee shall be discharged.
- D. Ad hoc committees expected to serve for more than three years, shall be reorganized and given the status of a sub-committee or special committee under the appropriate Council and should be appointed by the Board of Trustees.
- E. Between meetings of the House of Delegates ad hoc committees shall report to the Board of Trustees keeping it informed of all current activities.

Section 7. Board of Trustees Committees

These committees are detailed in CHAPTER VI. THE BOARD OF TRUSTEES Section 5 (D).

CHAPTER X. REFERENCE COMMITTEES

Section 1. Appointment. Immediately after the organization of the House of Delegates at each annual or special meeting, the speaker shall annuance the appointment from among the members of the House, such committees as may be deemed expedient by the House of Delegates.

Each committee shall consist of five or more members unless otherwise provided, the chairman to be announced by the speaker. These committees shall serve during the meeting at which they are appointed.

Section 2. Duties of Reference Committees. Refferences, resolutions, measures and propositions presented to the House of Delegates shall be referred to the appropriate committee, which shall report to the House of Delegates before final action shall be taken. A two-thirds affirmative vote of the House of Delegates shall be required to suspend this rule.

Section 3. Organization. Each reference committee shall, as soon as possible after the adjournment of each session, or during the session if necessary, take up and consider such business as may have been referred to it, and shall report on same at the next session, or when called upon to do so.

Section 4. Reference Committees. The following committees are hereby provided for:

- A Committee on Credentials
- A Committee on Rules and Order of Business Tellers and Sergeants-at-Arms
- A Committee on Changes in the Constitution and Bylaws

and such other committees as the speaker shall deem necessary to conduct the business of the House, or consider the reports of officers, trustees, executive administrator, the reports of committees pertaining to administrative activities, economics activities, scientific activities, public relations activities and legislative activities, as well as such resolutions, reports, and proposals as shall be brought before the House of Delegates.

Section 5. The Committee on Credentials shall consider all questions regarding the registration and the credentials of the delegates. It shall pass out and receive the attendance slips for each session of the House of Delegates, and perform any other duties assigned.

Section 6. Committee on Rules and Order of Business shall consider all matters regarding rules governing action, method of procedure and order of business for the House of Delegates.

Section 7. The Tellers and Sergeants-at-Arms shall

- A. Serve the speaker of the House of Delegates
- B. Distribute, collect and tally votes when a ballot is taken, or a numerical tally is required
- C. Certify those in attendance in closed or executive sessions of the House of Delegates.

Section 8. The Committee on Changes in Constitution and Bylaws shall consider all proposed amendments to the Constitution and Bylaws.

The chairman of the Committee on Constitution and Bylaws, or his representative, shall serve in an advisory capacity to this reference committee and shall attend all sessions, including the executive sessions of the reference committee, to assist in the preparation of the report of the committee of the House of Delegates.

CHAPTER XI. COUNTY SOCIETIES

Section 1. All county societies now in affiliation with this Society, or those which may hereafter be organized in this state, which have adopted principles of organization in harmony with this Constitution and Bylaws, shall upon application to and approval by the Board of Trustees, receive a charter from and thereby become a component part of this Society, and members thereof shall become members of this Society and the American Medical Association.

Section 2. Charters shall be issued only on approval of the Board, and shall be signed by the president and the secretary of this Society.

The Board shall have authority to revoke the charter of any component society whose actions are in conflict with the letter and spirit of this Constitution and Bylaws.

Section 3. Only one component medical society shall be chartered in any county.

Section 4. Every registered physician holding the title of Doctor of Medicine or its equivalent, who either (1) resides in the jurisdiction of a component society, or (2) resides in a state other than Illinois but practices principally in the jurisdiction of a component society and who is of good moral character and professional standing, shall be eligible to membership in that component society.

The component county society shall be the sole judge of the qualifications of its members, subject only to the stipulations contained in the Constitution and Bylaws.

Section 5. Any physician who has been disciplined by any action of a component society and believes he has not had a fair trial, shall have the right of appeal to the Board of Trustees.

Section 6. When a member in good standing in a component society changes his residence to an-

other county in this state, such change of residence shall terminate his membership in such component society. (This ruling shall not apply to members in military service or in the service of the State or the United States government.)

Such member shall be entitled, upon his request, to a statement from his former secretary as to his standing. This statement of standing shall be issued without cost to the applicant.

He shall present this statement to the component society of the county to which he removes and it shall accompany his application for membership. The board of censors of the society receiving this application shall give this statement of prior standing due consideration before accepting or rejecting his application for membership.

Section 7. A physician living on or near a county line, or practicing partly or totally in an adjacent county, may hold his membership in the county most convenient for him, provided he submits written authorization to that society from the component society in whose jurisdiction he resides.

Section 8. The secretary of each component society shall keep a roster of its members, in which shall be shown the full name, address, college and date of graduation, date of license to practice in this state, and such other information as may be deemed necessary. In keeping such a roster the secretary shall note any changes in the personnel of the profession by death or by removal to or from the county. When requested, he shall furnish on blanks supplied him for the purpose, an official report containing such information for the secretary of this Society and likewise for the trustee of the district in which his county is situated.

Section 9. The secretary of each component society shall forward its roster of officers and members, and a list of delegates and alternate delegates to the secretary of this Society before the fifteenth of January each year.

Section 10. Any component society which fails to pay its assessment or make the annual report required on or before March fifteenth shall be held as suspended and none of its members shall be permitted to participate in any of the business or proceedings of the Society or of the House of Delegates until such requirements have been met.

A member is in good standing unless otherwise disqualified, whose dues are paid on or before the first day of March of the current year. Immediately after the first of March, each delinquent member shall be notified that in consequence of non-payment of dues, his membership is delinquent. If dues remain unpaid as of June thirtieth of the current year, membership shall be dropped automatically. The member may be reinstated by pay-

ing all delinquent dues, provided, in the interim, he has not been guilty of conduct prejudicial to membership; but if two or more years have elapsed since he was a member in good standing, he must in addition, make application as a new member.

Section 11. The Constitution and Bylaws of the Illinois State Medical Society and of the American Medical Association, together with the Principles of Medical Ethics of the American Medical Association, shall be binding upon the members of the component societies.

CHAPTER XII. DISCIPLINE PART 1. COMPONENT SOCIETY PROCEDURE

Section 1. Local Ethical Relations Committee. Each component society may have, either by appointment or election, an Ethical Relations Committee, whose duty it shall be to prosecute formal charges of unethical conduct. In the event that the county society does not have such a committee, the district Ethical Relations Committee shall function in its behalf.

The component society (or district) Ethical Relations Committee may employ legal counsel. Such committees may establish reasonable rules of procedure, and they shall not be bound by the technical rules of evidence as the same pertain in courts of law. In all proceedings before such Ethical Relations Committees, the complainant, the accused and all witnesses before the committee shall be placed under oath.

Section 2. Offenses. Any member of a component society shall be subject to censure, suspension or expulsion by such component society when

- A. he has been adjudged guilty by proper civil authorities of a criminal offense involving moral turpitude, or
- B. he has been adjudged guilty by his component society in accordance with the procedural requirement of these bylaws:
 - (1) of a gross misconduct as a physician or surgeon, or
 - (2) of a violation of the Constitution or Bylaws of his component society, or of the Illinois State Medical Society, or of the Principles of Medical Ethics promulgated from time to time by the American Medical Association.

Section 3. Charges Initially Presented to the Illinois State Medical Society. Original complaints received by the Illinois State Medical Society should be referred directly to the secretary of the component society of which the accused is a member and to the appropriate district Ethical Relations Committee.

Section 4. Principles of Justice. The following principles of justice shall guide the Ethical Relations Committee in all disciplinary procedures.

- A. An accused is presumed to be innocent until he has been proven guilty.
- B. Formal charges before the Ethical Relations Committee of the component society or district Ethical Relations Committee, must be presented under oath by the complaining party.
- C. After formal charges have been preferred there shall be no evasion of the fact that the respondent is to be tried; that the Ethical Relations Committee before which he is cited to appear is a trial body and that he will be on trial when he appears.
- D. He must be notified by certified mail of the specific charges which are made against him at least ten days before the date set for his trial
- E. He may not be found guilty of anything not included in the charges preferred against him and presented to him.
- F. All evidence not pertinent to the charge as made shall be considered irrelevant and immaterial . . . it shall be wholly disregarded in the decision.
- G. Testimony not bearing on the charges shall be objected to and if sustained by the trial body, stricken from the records.
- H. The respondent shall be advised of his rights by the trial body, namely: (1) that he may be represented by any member of the society as counsel; (2) that he or his counsel may cross examine witnesses; (3) that he may offer in evidence any records or documents that he deems fit; (4) that he may enter objections as to testimony or to material offered in evidence; (5) that he may address the trial body in his own behalf; (6) and that he has the right of appeal to the Board of Trustees of the Illinois State Medical Society.

Section 5. Records. A comprehensive stenographic record of the proceedings must be kept for reference, and shall be available until final adjudication has been made.

In the event of an appeal being taken from the verdict of the local or district Ethical Relations Committee, the stenographic record shall be forwarded by certified mail to the Board of Trustees of the ISMS ten days prior to the date the appeal is to be heard. Failure to provide such records shall be grounds for a verdict of default against the component society.

Section 6. Verdict. The committee, sitting as a trial body, shall find the accused either guilty or not guilty. If the verdict is guilty, the trial body shall recommend censure, suspension or expulsion.

The findings of the trial body must be presented to the component county society for approval or rejection. The accused must be notified by certified mail at least ten days before the date set for the meeting at which this action will be taken. If the findings of the trial body are against the accused the secretary of the component society shall acquaint the accused, by certified mail, with his right of appeal within thirty days to the Board of Trustees of the Illinois State Medical Society.

PART 2. ILLINOIS STATE MEDICAL SOCIETY PROCEDURES

Section 7. Illinois State Medical Society Ethical Relations Committee. The Board of Trustees shall appoint from its members, an Ethical Relations Committee to review matters involving the interpretation of the Principles of Medical Ethics, violations of the Constitution and Bylaws of the Illinois State Medical Society or its component societies, and charges of misconduct of members of the Society.

It shall serve as an appellate body to review cases involving these matters referred by component medical societies, and shall consider matters of law (ethics) and procedure.

Section 8. Appeals from Component Society Verdicts. Appeals received by the Illinois State Medical Society Board of Trustees shall be referred to the Ethical Relations Committee of the Board for review. Appeals must be accompanied by pertinent data and transcripts indicating the basis for the appeal. Failure to provide such data shall be grounds for a verdict of default against the plaintiff. The committee shall notify the accused and the secretary of the component society by certified mail at least thirty days prior to the date set for the hearing of the appeal. The chairman of the committee shall preside over the hearing in accordance with the rules established by the Board of Trustees.

Section 9. Verdict. On conclusion of the hearing, the Ethical Relations Committee of the Board of Trustees shall meet in executive session to consider its decision, and shall report in writing to the Board at its next meeting for approval or rejection.

Section 10. Notification of Parties. The secretary of the Society shall notify the defendant and the secretary of the component society wherein the defendant holds membership, of the action of the Board.

- A. Right of Appeal to the American Medical Association. In case of findings against the accused, and in support of the action taken by the component society, the secretary of the state society shall notify the accused within ten days by certified mail of his right to appeal to the Judicial Council of the American Medical Association.
- B. Error. In the event of a decision by the Board of Trustees of improper law (ethics) and/or procedure by the trial body of the component society, the case shall be remanded with recommendations to the component society for reconsideration.

CHAPTER XIII. MISCELLANEOUS

Section 1. The fiscal year of this Society shall be from January 1 to December 31 inclusive.
Section 2. Robert's "Rules of Order, Revised," shall be the guide for all procedure when not in conflict with the Constitution and Bylaws.

CHAPTER XIV. AMENDMENTS

The House of Delegates may amend any article of these Bylaws by a two-thirds vote of the delegates present at any meeting, provided that such amendment shall not be acted upon before the day following that on which it was introduced.

Order of Business of the House of Delegates

FIRST SESSION

- (1) Call to order.
- (2) Report of Committee on Credentials.
- (3) Roll Call.
- (4) Reading and approval of minutes of last meeting.
- (5) Appointment of Reference Committees.
- (6) Reports of Officers.
- (7) Reports of the Trustees, the Editor, etc.
- (8) Reports of Standing Committees.
- (9) Reports of Board Committees.
- (10) Reports of Special Committees.
- (11) Reading of Resolutions.
- (12) Unfinished Business.
- (13) New Business.
- (14) Recess.

LAST SESSION

- 1. Call to order
- 2. Report of Committee on Credentials
- 3. Roll Call
- 4. Reports of Reference Committees
- 5. Fixing of per capita tax for ensuing year
- Selection of meeting place for next annual meeting. (Subject to the investigations of the Board.)
- 7. Unfinished business
- 8. Election of
 - (a) officers
 - (b) trustees
 - (c) delegates to the AMA
 - (d) alternate delegates to the AMA
- 9. Induction of President Elect into the office of President
- 10. New business
- 11. Adjournment (sine die)

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Policy Manual of the Illinois State Medical Society May 1967

"Policy statements shall be defined as guidelines for the management of the Illinois State Medical Society affairs, based upon prudence, sound judgment and experience.

"Rules and regulations may be prepared by the Board of Trustees or by committees, for use in the implementation of policy."

This manual shall be a guide for officers, trustees, committee chairmen and headquarters staff to the stand taken by the House of Delegates of the Illinois State Medical Society on all issues involving Society policy.

Its statements shall combine and reconcile the best expressions made on all phases of policy involving the House of Delegates, the Board of Trustees and the various committees.

All policy statements (except those involving the funds of the Society) shall have the approval of the House of Delegates, since the Constitution and Bylaws provide in ARTICLE V:

"The House of Delegates shall set the basic policy and philosophy of the Society."

All policy statements developed during the interval between meetings of the House shall be submitted at its next meeting for action. The House may:

- (1) approve, amend, or reject
- (2) refer the statement to the Board for reconsideration and subsequent report—
- (3) remand the statement to the committee from which it came for further study and report.

Policy statements for the consideration of the House may appear as a portion of the annual report of the Policy Committee, or they may be contained in other reports to the House. The final statements for publication in this Policy Manual are to be prepared by the Policy Committee. Any member of the Illinois State Medical Society may submit a policy statement for consideration.

Temporary policy between meetings of the House is determined by the Board. Committees may request Board consideration at any time.

The Illinois State Medical Society shall support policy statements approved by the House of Delegates of the American Medical Association.

National policy is the prerogative of the national association. Until specific contrary action emanates from the AMA House of Delegates, the Board of Trustees and the officers of the ISMS shall consider all such policy as binding.

Policy action at the state level does not rescind official AMA rulings in Illinois, and the Society must recognize such policy until it has been changed at the national level.

The same "chain of command" should exist between the county medical society and the ISMS House of Delegates. Policy established at the State Society level must prevail until majority action by the House of Delegates has rescinded or reversed the statements. This represents "majority rule" and must be followed closely to preserve the democratic processes.

Assessments

Compulsory assessments of members of hospital staffs for any purpose are unethical and improper.

Athletic Programs

Children of school age, through the 9th grade, should not participate in body contact sports.

Elementary school children develop better physically if activities are informal and not highly competitive.

Medical supervision of all athletic programs is essential.

Autonomy of County Medical Societies

No ruling of any county medical society shall conflict with the Principles of Medical Ethics of the American Medical Association, or with the Constitution and Bylaws of the Illinois State Medical Society.

In all other areas, the county society shall be autonomous.

Birth Certificates

Birth certificates should contain only such items as are pertinent to their function. Information recorded on birth certificates should not be provided to organizations or individuals for other than approved purposes.

Budgets—(see "Financial Policies") Committee Appointments

The chairman of the Board of Trustees and the officers of ISMS shall give the trustees an opportunity to recommend physicians from their districts for appointment to various committees of the Board. Trustees shall receive the proposed list of committee appointments for their consideration and review prior to the meeting of the Board at which the final committee personnel is to be approved.

Elective committees should serve for uniform terms of office—preferably three years. These terms of office should be held on a staggered basis to provide continuity in the committee structure. Individual tenure on any committee should be limited to a maximum of nine years of continuous membership—whether elected or appointed.

Communicable Diseases

Physicians, especially those engaged in public health work, should enlighten the public concerning all regulations and measures for the prevention and control of communicable diseases. When an epidemic prevails, a physician shall continue his labors without regard to his own health.

Community Health Week

The medical profession shall provide the scientific leadership to focus attention on the health needs of the community and to encourage and assist in developing Community Health Week activities.

Conflict of Interest

When a case of conflict of interest arises and is self-evident, by the attitude shown by the individual concerned, it should be referred to the Executive Committee of the Board of Trustees of the ISMS for consideration.

Constitution and Bylaws

Final copy of any changes made by the House of Delegates in the Constitution and/or the Bylaws shall be prepared for publication by the Committee on Constitution and Bylaws, in consultation with legal counsel, making sure that the published changes reflect the thinking expressed by the action of the House.

Continuing Education

Continuing education shall be one of the basic purposes of the Illinois State Medical Society for scientific advancement, humanization of medicine, improvement of medical public relations, and development of cooperation and rapport with the public.

Co-operation with the American Medical Association

Actions of the AMA House of Delegates are binding upon its membership at all levels, county, state and national.

(Since all members of the Illinois State Medical Society are also members of the American Medical Association, this is universally true in Illinois. The right to disagree, the right to protest, the right to become "the loyal opposition" is not questioned. However, until such time as the AMA House has reversed its decision, it is mandatory that the membership abide by the will of the majority.)

Cultists, Association with

The Judicial Council of the American Medical Association has ruled that it is unethical to associate VOLUNTARILY with an individual who practices as a member of a "cult."

Disaster Control

Any disaster creates an obvious need for trained personnel to aid the sick and injured. Local medical societies should cooperate to provide medical self-help programs. County societies should provide training for their membership in the treatment of mass casualties, radiological casualties and in the organization, operation and maintenance of emergency hospitals.

Discrimination—(see "Freedom of Choice")

Dues, Recommendation of the Board to the House

The chairman of the Board of Trustees shall place the question of dues for the coming year on the agenda for consideration at the spring meeting of the Board.

Immediately following this meeting, written notice of the recommendation regarding dues for the next fiscal year, shall be mailed to all delegates and alternate delegates from the component societies, and also to all presidents and secretaries of county medical societies. This recommendation shall also be published in the Illinois Medical Journal as a part of the annual report of the chairman of the Board.

Education

Primary and secondary education is a community problem. In order to retain jurisdiction of these grade schools, finances should be raised by taxation at the local level.

Ethics

Cases involving ethics shall reach the state society level only by means of an appeal. As outlined in the Bylaws, the state society committee shall serve only as an appellate body to review such cases.

Examinations

All physical examinations should be performed in the physician's office. No examinations should be conducted on a group basis unless authorization has been given by the local county medical society in a single instance or for a specific purpose.

This general statement does not apply to the industrial or occupational health physician in his in-patient activities.

Federal Funds

When a federal government assistance program is essential it should be conducted under the administration and control of local government. The Society does not favor any federal assistance program which removes administrative control from the state or local level.

Fee Schedules

No member or committee shall be permitted to approve a fee schedule for the Illinois State Medical Society until it has been submitted to and approved by the House of Delegates or the Board of Trustees.

Individuals covered by various fee schedules shall receive the best type medical care in all cases, and the physicians involved shall be remunerated according to the accepted fee schedule. Fees should be commensurate with services rendered.

Financial Policies (also see "Assessments," etc.)

(1) The Finance Committee is to make budg-

etary recommendations to the Board of Trustees; however, such recommendations must be approved by the Board.

- (2) The expenses of any duly elected delegate or alternate delegate attending the meetings of the House of Delegates of the American Medical Association shall not be assumed by the ISMS until he enters his official term of office set by the Constitution and Bylaws of the AMA.
- (3) The expenses of any official representative of the ISMS attending any authorized meeting shall be determined by the Finance Committee and approved by the Board of Trustees.
- (4) Any new project authorized by House action requiring the expenditure of funds must be accompanied by an estimate of the cost and suggested methods of providing the necessary funds.
- (5) Budgets submitted to the House by the Board should provide for the ensuing fiscal year.
- (6) In addition to fixed reserves, the development of a contingency reserve is desirable.

Freedom of Choice

The mutual right of physicians and patients to exercise freedom of choice in medical matters shall be maintained. This includes the right of the patient to choose the physician by whom he will be served, and the right of the physician (except in emergencies) to a corresponding freedom of choice. All members of the Illinois State Medical Society enjoy the same rights and privileges and are bound by the same obligations and standards of professional conduct.

Health Care-Ancillary Services

All segments of our population are entitled to and shall receive the best health care available. The physicians in Illinois are encouraged to cooperate in the implementation of any national program meeting with the general policy statements of the Society. (This shall be interpreted to include health aspects in nursing home care, use of recreational facilities, environmental health, public health, employment problems, etc., and any other area which involves the health of the residents of this State.)

Health Care Costs

The public should be educated concerning the difference between "health care costs" and "medical care costs." Members of the profession should cooperate with the various ancillary groups and should be able to explain the cost factors involved in total care.

Health Careers

All capable and worthy individuals interested in medicine as a career shall be encouraged and assisted by the Illinois State Medical Society. Those interested in paramedical fields shall be provided with all pertinent information.

Hospitals

Physicians should sponsor and assist in the development of all medical staff committees within the hospital.

The local medical profession should cooperate to achieve the accreditation of all eligible hospitals, and should encourage the stabilization or reduction of hospital costs in all areas where they have authority.

Hospital Assessments—See Assessments Hospital Records and Their Availability

Hospital records are privileged information and the property of the patient, kept in trust by the hospital. They are not to be released except on a court order.

Upon receipt of a request signed by the patient, an abstract or a summary shall be provided when needed, to insurance companies, governmental agencies, consulting physicians, etc.

Hospital Staff Privileges

The medical staff of a hospital does not have the privilege or the right to make compulsory assessments of members of the medical staff for building funds, or to demand an audit of staff members' personal financial records as a requisite for staff appointments.

House of Delegates, Special Meetings of

When a special meeting of the House of Delegates is scheduled which may involve an increase in dues or a special assessment, the call for that meeting shall contain specific notification of that possibility.

Immunization Program

Illinois residents should be provided all types of immunization. Physicians are requested to provide this protection especially to all children, or to encourage the local public health agency to perform this function.

Every school should have a school health committee with at least one physician as a member. County advisory school health councils should assist in coordination.

Indigent, The Care of the

Personal medical care is primarily the responsibility of the individual. When he is unable to provide this care for himself, the responsibility should properly pass to his family, the community, the county, the state, and only when all these fail, to the federal government, and only in conjunction with the other levels of government in the order above.

The determination of medical needs should be made by a physician. The determination of eligibility should be made at the local level with local administration and control. The principle of freedom of choice should be preserved.

Individual Rights

Since this Society believes that a strong America is a free America, the rights of an individual, or a group of individuals, to openly express themselves cannot be condemned even if one is in complete disagreement, if the laws of the land are not violated. To support such condemnation would be inconsistent with this Society's basic philosophy.

Insurance Plans

Physicians are urged to cooperate with voluntary health insurance plans approved by the Illinois State Medical Society.

Fixed fee schedules should not be accepted. All fees should be based upon the usual and customary fee concept.

Insurance programs for the membership of the Illinois State Medical Society should be studied and implemented by the proper committee. Major medical and comprehensive hospital group coverage should be part of this insurance package.

Journal Publication

The Journal Committee, with the approval of the Board of Trustees, has authority over the publication policy and the screening of all advertisers and advertising copy appearing in the Illinois Medical Journal.

Laboratories

All laboratories providing medical data should be under the direct supervision of a physician.

Lay Employees and Their Prerogatives

Policy is established by the House of Delegates. Staff shall cooperate with officers and committee chairmen in setting up activities and in carrying out all necessary routine.

Staff also shall keep new officers and committee chairmen aware of policy statements, and assist them in the preparation of reports to the House of Delegates to:

change existing policy
establish new policy
request House approval of committee
projects and/or
procedure involving policy.

Committees shall be informed of their right to set up operating rules and regulations.

Legal Counsel

The legal counsel of the Illinois State Medical Society shall concern himself with official inquiries from officers, trustees, committee chairmen and county medical societies. Such inquiries shall be channeled through the Executive Administrator.

Legislation

All matters pertaining to state or federal legislation shall be referred to the Legislative Committee for consideration and recommendation prior to Board of Trustees and/or House of Delegates action.

Matters pertaining to federal legislation shall be checked against recommendations or policies of the American Medical Association by the Legislative Committee of the Illinois State Medical Society prior to making a recommendation either to the Board of Trustees or to the House of Delegates.

Before any legislation is developed for presentation to the Illinois General Assembly, the proposed law shall be considered by the Legislative Committee, which shall work in close cooperation with any other Society committee involved. The instigating committee should determine the content of the law and the Legislative Committee primarily should consider relationship of the proposed legislation to the total legislative program.

Mailing List

The use of the mailing list of ISMS members must be approved by special action of the Board of Trustees.

Medical Care, Provision of

Medical care shall be provided regardless of the ability of the patient to pay. Physicians shall not refuse to render needed emergency care to any patient.

Membership in Paramedical and Service Organizations

Membership in Chambers of Commerce (city, state and national) is to be encouraged. This policy extends to the individual physician as well as to the component societies.

Membership in the Illinois Association of the Professions is encouraged. Medicine should be well represented among these allied professional groups and the growth and development of the Association is of concern to ISMS economically, politically and scientifically.

The Society recommends that physicians affiliate with service clubs, local political action groups and participate to the fullest extent possible in affairs affecting the health and welfare of the residents of Illinois.

Mental Health

Mental health planning should be implemented at the community level. County medical societies should be kept aware of their responsibilities to assist in developing improved mental health facilities.

A physician licensed to practice medicine in all its branches should be required to certify the discharge of any patient from a psychiatric institution.

Occupational Health

Occupational health is an essential ingredient of employee welfare. The adoption and development of health programs in industry should be encouraged.

Occupational health will be advanced through the utilization of all physicians involved in industrial work.

Placement Service

Before the Physicians' Placement Service recommends that a town in Illinois be listed as needing a physician, it shall be established that the need actually exists; that the community can support a physician; that certain physical assets (office—home—schools, etc.) are available for the physician and his family.

The qualifications of the physician also shall be ascertained prior to furnishing him with the list of available areas in Illinois needing a physician.

Policy Statements

Policy statements shall be defined as guide lines for the management of the Illinois State Medical Society affairs, based upon prudence, sound judgment and experience.

Rules and regulations may be prepared by the Board of Trustees or by committees, for use in the implementation of policy.

Polls, Opinion

The vote of the House of Delegates shall express the opinion of the majority of the Illinois State Medical Society membership. Since delegates are the duly elected representatives of their county medical societies and their voting reflects the thinking of their constituents, a majority opinion HAS BEEN expressed, and a membership poll becomes unnecessary except under very exceptional conditions.

Prepayment Plans and Organizations

It is not within the province of ISMS to act in other than an advisory capacity when working with a "third party plan," and its best efforts should be directed toward supplying guidance, education and communications between the membership and the prepayment plans and organizations involved.

The principle of free enterprise as exemplified by private insurance companies and the "Blue" plans is to be endorsed.

Press

All county medical societies should cooperate with the local press. The public should be provided with prompt and accurate information in all health fields; the source of this information should be the medical profession.

County medical societies should provide information at the local level; the State Society is responsible for press releases involving State Society officers or any official statements of the Society appearing in the press.

A code of ethics applicable to medicine and the fourth estate should be developed. (That used in the Decatur area has been given national recognition by the AMA.)

Publication of Research Data

In releasing research material for publication in the Illinois Medical Journal, or any other media, extreme care should be exercised. The welfare and privacy of the patient, the professional reputation of the physician should be of primary concern.

If any question arises, consultation with the Board of Trustees is suggested. All such inquiries should be addressed to its chairman.

Public Affairs

No officer or member of the Board of Trustees should be permitted (during his term of office) to allow his name as an officer or a member of the Board to be used in lists endorsing candidates for public office. Naturally his right to this privilege as a private individual is not affected.

Public Aid

The "chain of command and procedure" in handling problems arising in the field of public aid shall be from the county to the state society advisory committee; then the state advisory committee shall assume the responsibility of making the medical program work and cooperating with the Illinois Department of Public Aid to maintain the best type medical care for the recipients of state aid.

The fees paid by the state/federal programs to physicians shall be based upon the usual and customary fee concept.

An extensive program of education should be conducted for the recipients of public aid. This should include the intelligent handling of all monies provided.

Rehabilitation of all recipients should be of paramount concern.

Public Safety

Motor vehicle operators should be licensed on the basis of the applicant's physical and mental capacity to operate such a vehicle safely.

Reference Committee Appointments

Whenever possible at least two members shall be retained on all reference committees for the following year in order to effect continuity of experience.

Reference Service

Physician reference service shall be the responsibility of the county medical society. When any such request is received at the state society office or by any officer of the ISMS, it shall immediately be referred to the secretary of the county medical society involved.

Rehabilitation

All physical rehabilitation activities should be prescribed by a physician and the treatment carried out under the supervision of a physician.

Medical societies should render assistance to public and private agencies regarding rehabilitation facilities to be used and in the selection of patients for these services. Insurance carriers should be encouraged to include rehabilitation services in their contracts.

Relative Value

The Relative Value Study is not a fee schedule and is to be used for information only.

No co-efficient shall be established at the state level. The data contained in the study may be used by the ISMS, its committees or by any county medical society.

The study should be revised at appropriate intervals upon the recommendation of the committee with the approval of the Board of Trustees.

Upon request, copies may be furnished third party purveyors of health care services.

Stationery, Use of Official

No officer, trustee, committee chairman or staff director is to use the official stationery of the Illinois State Medical Society for personal statements of any nature. This shall pertain especially to the endorsement of any candidate for public office.

Surveys

The Illinois State Medical Society endorses the principle of mass surveys and encourages the use of this method whenever it meets with the approval of the local county medical society.

Any new state program involving more than one county society should be submitted to the Board of Trustees for initial approval.

Veterans Administration

It is our belief that a Veterans Administration hospital should admit only those patients with service-connected disabilities, except in those instances where the veteran is financially unable to pay for his medical care and hospital services, as shown by a means test.

Woman's Auxiliary

Projects in which the Auxiliary participates shall be approved by the local county medical society.

Requests for cooperation between the Auxiliary and the Illinois State Medical Society should be channeled through the Advisory Committee provided by the Board of Trustees.

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The House of Delegates

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Arkell M. Vaughn	Edward W. Cannady
THE THUBING THE TOUBLE TO STATE OF THE STATE	Land III Camada

CHICAGO MEDICAL SOCIETY DELEGATES AND ALTERNATES			
Aux Plaines Branch		North Shore Branch	
Delegates	Alternate Delegates	Delegates	Alternates
Joseph C. Sodaro	Gustav Hemwall	George H. Irwin	Rocco V. Lobraico
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A. Everett Joslyn, Jr.	Robert C. Muehrcke	Willis Diffenbaugh	Samuel T. Gerber
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a		William O. Ackley	David T. Petty
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Eugene F. Diamond	Thaddeus C. Fial		
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Robert E. Lee	Nestor 3. Wartinez	Michael H. Boley	Joseph Sherrick
Douglas Park Branch		Roland R. Cross	R. Gilchrist
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Colman J. O'Neill	Robert F. Cesafsky	Vincent C. Freda	Richard Perritt
L. S. Tichy	Paul Zettas	Jack Williams	Benjamin F. Lounsbury
· ·		Erwin M. Patlak	Gustav L. Kaufmann
Englewood Branch		Clifton L. Reeder	Joseph Schifano
M. Gino	S. Hamilton	James P. Fitzgibbons	Lydia Nikurs
Edw. Krol	John Krolikowski	Northwest Branch	
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F. Saletta	Kosme Kapov	Richard V. Kochanski	Chester Podgorski
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		Michael J. Kutza	J. M. Smialek
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William 3. 1 itzi atriek	John W. O Bollien	Robert R. Mustell	Maurice Gleason
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Eugene Broccolo	Sanford Franzblau	Stock Yards Branch	
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Eugene Narsete	H. Paul Carstens	Edwin J. Lukaszewski	Joseph M. Ruda
Allen Hrejsa	Alexander Ruggie	W . C' ! P	
		West Side Branch	Eugene T. Heben
Jackson Park Branch		George Kaiser Anna Marcus	Eugene T. Hoban George Rezek
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Charles P. McCartney	Myron M. Hipskind	Noel G. Shaw	Fred A. Tworoger

Fred A. Tworoger

Charles P. McCartney

Myron M. Hipskind

Noel G. Shaw

DOWNSTATE DELEGATES AND ALTERNATES

County Delegate Alternate	County Delegate Alternate
Adams County—6th District	HENRY-STARK COUNTY—4th District
Richard R. Cooper Harold Swanberg	Paul M. Schmidt William D. Larson
ALEXANDER COUNTY—10th District	IROQUOIS COUNTY—11th District
Howard D. Stuckey Charles L. Yarbrough	R. Kent Swedlund James Dailey
Bond County—7th District	Jackson County—10th District
Boyd McCracken Max Fraenkel	J. A. Petrazio
Boone County—1st District	JASPER COUNTY—8th District
John H. Steinkamp M. Paul Dommers	Don L. Hartrick C. O. Absher
BUREAU COUNTY—2nd District	JEFFERSON-HAMILTON COUNTY—9th District
George Giffin Louis Lukancic	JERSEY COUNTY—6th District
CARROLL COUNTY—1st District	JoDaviess County—1st District
Lemuel B. Hussey B. V. Gunnarsson	C. George Ward Ray E. Logan
Cass-Brown County—6th District	JOHNSON COUNTY—10th District
B. A. DeSulis James J. Hea	E. A. Veach
CHAMPAIGN COUNTY—8th District	KANE COUNTY—1st District
Richard E. Schaede Donald G. Rumer	Donald Schleifer H. W. Bruskewitz
Clarence H. Walton H. J. Kolb	B. F. Shirer J. L. Bordenave
CHRISTIAN COUNTY—7th District	B. F. Shirer J. L. Bordenave Wayne N. Leimbach Peter Starrett
R. B. Siegert R. M. Seaton	KANKAKEE COUNTY—11th District
CLARK COUNTY—8th District	Dale M. Learned Charles Allison
Eugene P. Johnson George T. Mitchell	Kendall County—11th District
CLAY COUNTY—7th District	Ray C. Crawford Victor Smith
H. D. Fehrenbacher L. L. Hutchens	KNOX COUNTY—4th District
CLINTON COUNTY—7th District	J. J. Holland William Johnson
F. H. Ketterer Wilson L. DuComb	LAKE COUNTY—1st District
Coles-Cumberland County—8th District	Donald C. Nellins Earl V. Klaren
Joseph R. Mallory Mack W. Hollowell	Charles U. Culmer Kenneth L. Morris
Crawford County—8th District	Michael J. McAndrew John Andrews
DEKALB COUNTY—1st District	LaSalle County—2nd District
John W. Ovitz Frank Luedtke	William Scanlon
DEWITT COUNTY—5th District	Lawrence County—8th District
George Castrovillo H. L. Meltzer	Gilbert Miller C. G. Stoll
Douglas County—8th District	LEE COUNTY—2nd District
Elmer S. Allen Walter G. Steiner	William A.
DuPage County—11th District	McNichols, Jr. Charles H. LeSage
Morgan Meyer Arthur P. LeBeau	Livingston County—2nd District
Morgan Meyer Arthur P. LeBeau James P. Campbell F. C. Kuharich	Don L. Ervin Dean G. Peterson
J. P. Schweitzer B. L. Rodkinson	Logan County—5th District
William E. Hill Ralph Ryan	Glen E. Tomlinson Wayne J. Schall
EDGAR COUNTY—8th District	McDonough County—4th District
J. M. Ingalls Joseph R. Shackelford	V. Burdette Adams Donald H. Dexter
EDWARDS COUNTY—9th District	McHenry County—1st District
Andrew Krajec Paul S. Nierenberg	
EFFINGHAM COUNTY—7th District	
P. C. Rumore Henry J. Poterucha	McLean County—5th District L. T. Fruin A. E. Livingston
FAYETTE COUNTY—7th District	_
S. W. Moore J. H. Weiner	MACON COUNTY—7th District
FORD COUNTY—11th District	Maurice D. Murfin H. J. Burstein
Ross Hutchison	C. Elliott Bell C. F. Downing
Franklin County—9th District	MACOUPIN COUNTY—6th District
H. L. Lewis John P. Pope	Joseph J. Grandone T. Weatherford
Fulton County—4th District	Madison County—6th District
Keith H. Frankhauser Paul D. Reinertsen	E. K. DuVivier James Adams
GALLATIN COUNTY—9th District	W. W. Bowers Ben Berman
W. F. Stanelle John E. Doyle	MARION COUNTY—7th District
Greene County—6th District	Karl Venters M. Herschfelder
HANCOCK COUNTY—4th District	Mason County—5th District
C. W. Bruehsel Byron I. Mueller	Jack Means Donald Stehr
Henderson County—4th District	Massac County—9th District
Silvino Lindo Harold Bock	Menard County—5th District
Sitting Emily Harold Dock	200111

Delegate Alternate County MERCER COUNTY-4th District M. E. Conway MONROE COUNTY-10th District Edilberto F. Maglasang Joseph A. Werth Montgomery County-5th District Morgan County-6th District Ernst C. Bone Albert Fricke MOULTRIE COUNTY-7th District OGLE COUNTY—1st District A. R. Bogue R. W. Zack PEORIA COUNTY-4th District Wm. O. McQuiston G. W. Giebelhausen Norman Powers S. M. Scalzo Fred Z. White George J. Best PERRY COUNTY-10th District J. B. Stotlar C. E. Cawvev PIATT COUNTY—7th District A. O. Trimmer W. E. Mundt PIKE-CALHOUN COUNTY—6th District Myer Shulman James E. Goodman Pulaski County—10th District A. L. Robinson James Conger RANDOLPH COUNTY—10th District O. W. Pflasterer W. W. Fullerton RICHLAND COUNTY—8th District Charles DeKovessey William A. Moore ROCK ISLAND COUNTY-4th District Joseph G. Gustafson L. S. Helfrich Theodore Grevas C. S. Costigan St. CLAIR COUNTY-10th District William Walton Lloyd Walk Vivien P. Siegel Harold McCann Saline-Pope-Hardin County—9th District

John Duffey Sangamon County—5th District Chauncey C. Maher, Ross Schlich Jr.

Preston V. Dilts Floyd S. Barringer Richard F. Herndon A. R. Eveloff

Delegate County Alternate

SCHUYLER COUNTY-4th District Henry C. Zingher Rosemary Utter

SHELBY COUNTY-7th District

O. G. Kauder C. A. Spears STEPHENSON COUNTY—1st District

T. A. Haymond H. R. Osheroff TAZEWELL COUNTY—5th District

Joseph Aronoff Rudolph A. Helden

Union County-10th District VERMILION COUNTY-8th District

E. G. Andracki T. E. Pollard

WABASH COUNTY-9th District

Ernest Lowenstein C. L. Johns

WARREN COUNTY-4th District

Richard Icenogle Kenneth Ambrose

Washington County-10th District

Jerry L. Beguelin

WAYNE COUNTY-9th District

Charles J. Jannings Edward S. Talaga

WHITE COUNTY-9th District

S. B. Abelson J. A. Stricklin

WHITESIDE COUNTY—2nd District

Isaac Vandermyde Clarence J. Mueller

WILL-GRUNDY COUNTY-11th District

Robert J. Becker James H. Lambert Bruce J. Wallin Franklin K. Bowser F. Roger Fahrner Barry S. Seng

WILLIAMSON COUNTY-9th District

Herbert V. Fine

WINNEBAGO COUNTY—1st District

L. P. Johnson Robert E. Heerens F. A. Munsev H. E. LaPlante Harold E. Zenisek E. T. Leonard WOODFORD COUNTY-2nd District

J. C. Phifer H. W. Riggert

OFFICERS OF COUNTY MEDICAL SOCIETIES 1967

ADAMS COUNTY

President: Robert Murphy 1416 Maine St., Quincy 62301 Secretary: Ralph F. Davis WCU Bldg., Quincy 62301 Members: 74—District No. 6

ALEXANDER COUNTY

President: Lewis Ent, 309-8th St., Cairo 62914

Secretary: Charles L. Yarbrough 8001/2 Commercial Ave., Cairo 62914 Members: 10—District No. 10

BOND COUNTY

President: M. Kenneth Kaufmann 207 North Second St., Greenville 62246

Secretary: Charles R. Daisy

308 West College, Greenville 62246 Members: 8—District No. 7

BOONE COUNTY

President: Maurice Carlisle

115 West Lincoln, Belvidere 61008

Secretary: Earl S. Davis

119 S. State St., Belvidere 61008 Members: 14-District No. 1

BUREAU COUNTY

President: W. E. Erkonen

101 Park Ave., Princeton 61356

Secretary: Karl D. Nelson

101 Park Ave., East, Princeton 61356

Members: 29—District No. 2

CARROLL COUNTY

President: E. M. Colli, RFD 1, Mt. Carroll 62863 Secretary: Wilhelm Jawurek, Chadwick 61014

Members: 11-District No. 1

CASS COUNTY

President: Robert A. Spencer, Beardstown 62618

Secretary: Arthur G. Hyde, Beardstown 62618

Members: 14-District No. 6

CHAMPAIGN COUNTY

President: Donald Ross

401 E. Springfield Ave., Champaign 61820

Secretary: H. E. Wachter

104 West Clark, Champaign 61820

Members: 159-District No. 8

CHICAGO MEDICAL SOCIETY

President: Francis W. Young

310 S. Michigan Ave., Chicago 60602

President-Elect: Ralph E. Dolkart

310 S. Michigan Ave., Chicago 60602

Secretary: Fred A. Tworoger

310 S. Michigan Ave., Chicago 60602

Treasurer: H. Kenneth Scatliff

310 S. Michigan Ave., Chicago 60602

Executive Administrator: John W. Neal

310 S. Michigan Ave., Chicago 60602

Members: 6,515—District No. 3

CHRISTIAN COUNTY

President: J. W. Murphy

301 S. Webster, Taylorville 62568

Secretary: H. P. Joslyn

210 S. Washington, Taylorville 62568

Members: 29—District No. 7

CLARK COUNTY

President: Eugene P. Johnson, Casey 62410

Secretary: Charles C. Moore, Jr.

Martinville Clinic, Martinville 62442

Members: 7—District No. 8

CLAY COUNTY

President: William T. Kamp

433 E. 7th St., Flora 62839

Secretary: Donald L. Bunnell

433 E. 7th St., Flora 62839

Members: 15-District No. 7

CLINTON COUNTY

President: F. H. Ketterer, Breese 62230

Secretary: J. Roger Sosa, German Town 62245

Members: 10-District No. 7

COLES-CUMBERLAND COUNTY

President: Stanley W. Thiel

Link Clinic, Mattoon 61938

Secretary: G. D. Wright

1517 University Ave., Charleston 61920

Members: 43—District No. 8

CRAWFORD COUNTY

President: Charles Salesman

1201 N. Allen, Robinson 62454

Secretary: John W. Long, Robinson 62454

Members: 17—District No. 8

DE KALB COUNTY

President: William G. Thomas

204 W. Elm St., Sycamore 60178

Secretary: H. Logan Fisher

De Val Shopping Center, DeKalb 60115

Members: 49—District No. 1

DE WITT COUNTY

President: John W. Veirs

219 E. Main, Clinton 61727

Secretary: Charles Ramey

215 E. Main, Clinton 61727

Members: 12-District No. 5

DOUGLAS COUNTY

President: Walter G. Steiner

140 W. Sale, Tuscola 61953

Secretary: Travis L. Hindman

207 E. Van Allen, Tuscola 61953

Members: 15—District No. 8

Du Page County

President: B. L. Rodkinson

5019 Fairview, Downers Grove 60515

Secretary: Charles A. Lang

222 E. Willow, Wheaton 60187

Corresponding Secretary: Mrs. Lillian Widmer

222 E. Willow, Wheaton 60187

Members: 292-District No. 11

EDGAR COUNTY

President: C. A. McClelland

Box 298, Paris 61944

Secretary: J. M. Ingalls

502 Shaw Ave., Paris 61944

Members: 12-District No. 8

EDWARDS COUNTY

President: Paul S. Neirenberg

7 W. Main St., Albion 62806

Secretary: Andrew Krajec

Box 336, West Salem 62476

Members: 4—District No. 9

EFFINGHAM COUNTY

President: Delbert G. Huelskoetter

Altamont 62411

Secretary: Robert F. Gilbert

401 N. Mulberry, Effingham 62401

Members: 22—District No. 7

FAYETTE COUNTY

President: J. H. Weiner

503 Gallatin, Vandalia 62471

Secretary: E. A. Kuehn

501½ W. Gallatin, Vandalia 62471

Members: 12-District No. 7

FORD COUNTY

President: Paul Sunderland

214 N. Sangamon St., Gibson City 60936

Secretary: Alan Olson

130 N. Center, Paxton 60957

Members: 11—District No. 11

FRANKLIN COUNTY

President: John P. Pope

Pope Bldg., Benton 62812

Secretary: Charles E. Ahlm

107 S. Van Buren St., West Frankfort 62896

Members: 22-District No. 9

FULTON COUNTY

President: Carl Barthelemy

28 N. Main, Canton 61520

Secretary: O. M. Wood, Ipava 61441

Members: 26—District No. 4

GALLATIN COUNTY

President: Joe Bryant, Ridgway 62979 Secretary: John Doyle, Ridgway 62979

Members: 4—District 9

GREENE COUNTY

President: F. Earl Walker

213 W. Clay St., Roodhouse 62082

Secretary: Paul A. Dailey

620 N. Main St., Carrollton, 62016

Members: 8-District No. 6

HANCOCK COUNTY

President: Irving Burnell

861 S. State St., Augusta 62311

Secretary: Ilse Erika Brueshel, Warsaw 62379

Members: 13-District No. 4

HENDERSON COUNTY

President: Elmer Swann, Oquawka 61469 Secretary: Harold L. Bock, Stronghurst 61480

Members: 3-District No. 4

HENRY-STARK COUNTY

President: James C. Parson

113 S. College, Geneseo 61250

Secretary: A. W. Welstein

213 W. First St., Geneseo 61250

Members: 35-District No. 4

IROQUOIS COUNTY

President: J. M. Roberts, Watseka 60970 Secretary: Ryland Buckner, Gilman 60938

Members: 22—District No. 11

Jackson County

President: John R. McGowan

503 S. University, Carbondale 62901

Secretary: Homer H. Hanson

P.O. Box 1030, Carbondale 62901

Members: 48—District No. 11

JASPER COUNTY

President: Don Hartrich

625 W. Jourdan, Newton 62448

Secretary: C. O. Absher, Newton 62448

Members: 4—District No. 8
JEFFERSON-HAMILTON COUNTY

President: Morris Zelman

117 N. 10th, Mt. Vernon 62864

Secretary: H. Goff Thompson

112 N. 11th St., Mt. Vernon 62864

Members: 22-District No. 9

JERSEY-CALHOUN COUNTY

President: Bernard Baalman, Hardin 62047

Secretary: Victor Oberheu

306 S. Washington St., Jerseyville 62052

Members: 10-District No. 6

Jo Daviess County

President: David Hockman

300 Summit St., Galena 61036

Secretary: William G. Gillies

300 Summit St., Galena 61036

Members: 11—District No. 1

KANE COUNTY

President: Robert Cummins

895 Geneva Rd., St. Charles 60174

Secretary: Robert G. Stone

860 Summitt St., Elgin 60120

Corresponding Secretary: Elsa Carlson

17 N. Sixth St., Geneva 60134 Members: 246—District No. 1

KANKAKEE COUNTY

President: Donald A. Meier

555 S. Schuyler, Kankakee 60901

Secretary: Herbert P. Swartz

450 Kennedy Dr., Kankakee 60901

Members: 80-District No. 11

KENDALL COUNTY

President: John P. Cullinan

Main St., Oswego 60543

Secretary, Joseph L. Daw, Oswego 60543

Members: 9-District No. 11

KNOX COUNTY

President: R. B. Howell

1134 N. Henderson St., Galesburg 61401

Secretary: Walter J. Zich

St. Mary's Hospital, Galesburg 61401

Members: 60-District No. 4

LAKE COUNTY

President: John J. Ring

511 E. Hawley St., Mundelein 60060

Secretary: Richard Hawkins

535 W. Park Ave., Libertyville 60048

Executive Secretary: Mrs. Julie P. Schulz

P.O. Box 148, Gurnee 60031

Members: 234—District No. 1

LA SALLE COUNTY

President: G. A. Neufeld

230 W. Madison St., Ottawa 61350

Secretary: Allan L. Goslin

712 N. Bloomington, Streator 61364

Members: 106-District No. 2

LAWRENCE COUNTY

President: Tom Kirkwood

Kensler Bldg., Lawrenceville 62439

Secretary: Gilbert Miller

Kensley Bldg., Lawrenceville 62439

Executive Secretary: Ruth E. Gariepy

Lawrence Cty. Mem. Hospital Lawrenceville 62439

Lawrencevine 02437

Members: 11—District No. 8

LEE COUNTY

President: Donald Edwards

821 S. Peoria St., Dixon 61021

Secretary: George Silvest

114 E. Everett Ave., Dixon 61021

Members: 21—District No. 2

LIVINGSTON COUNTY

President: Andrew McGee

717 N. Main, Pontiac 61764 Secretary: Dean G. Peterson

204 N. Locust St., Pontiac 61764

Members: 30—District No. 2

LOGAN COUNTY

President: Robert Trapp

514 Pekin St., Lincoln 62656

Secretary: Glen Tomlinson

301 Walnut St., Lincoln 62656

Members: 25—District No. 5

MACON COUNTY

President: Dean F. Stanley 250 N. Water, Decatur 62523

Secretary: Paul Reeder

2113 N. Edward, Decatur 62526 Executive Secretary: Mary J. Bretz 1800 E. Lake Shore Dr., Decatur 62521

Members: 136-District No. 7

MACOUPIN COUNTY

President: H. A. Finney, Girard 62640

Secretary: J. J. Grandone 109 W. Pine, Gillespie 62033 Members: 25—District No. 6

MADISON COUNTY

President: Felicia D. Koch, Granite City 62042

Secretary: Leo R. Green 1114 Milton Rd., Alton 62005 Members: 127—District No. 6

MARION COUNTY

President: Karl Venters, Box 478, Centralia 62801

Secretary: Walter Plassman 630 Short St., Centralia 62801 Members: 31—District No. 7

MASON COUNTY

President: Dario Landazuri 125 N. Orange St., Havana 62644 Secretary: Henry W. Maxfield 321 E. Chestnut, Mason City 62644

Members: 12-District No. 5

MASSAC COUNTY

President: James Bremer 803 Market, Metropolis 62960

Secretary: George Green, Metropolis 62960

Members: 8-District No. 9

McDonough County

President: R. G. Trummel 215 E. Carroll, Macomb 61455 Secretary: Frank De Rango

531 E. Grant, Macomb 61455 Members: 21—District No. 4

McHenry County

President: R. S. Loewenherz

154 Lincoln Pkwy., Crystal Lake 60014 Secretary: Mladen Mijanovich 556 E. Grant St., Marengo 60152

Executive Secretary: Evelyn Rosulek 308 Kimball Ave., Woodstock

Members: 60-District No. 1

McLean County

President: George W. France 510 S. Denver St., Bloomington 61701

Secretary: Preston Houk

429 N. Main St., Bloomington 61701 Executive Secretary: David W. Meister 429 N. Main St., Bloomington 61701

Members: 90—District No. 5

MENARD COUNTY

President: Barry D. Free, Petersburg 62675

Secretary: H. K. Moulton

119 N. 7th St., Petersburg 62675

Members: 3—District No. 5

MERCER COUNTY

President: Wilbur A. Miller 111 N. Maple St., Aledo 61231 Secretary: James W. Hastings

209 S. College Ave., Aledo 61231

Members: 5-District No. 4

MONROE COUNTY

President: Otto Kremer

854 W. Bottom, Columbia 62236 Secretary: Edilberto F. Maglasang 109 W. Legion, Columbia 62236 Mambasa R. District No. 10

Members: 9—District No. 10

Montgomery County

President: Ernest Frank

St. Francis Hospital, Litchfield 62056

Secretary: George Telfer

400 Rountree, Hillsboro 62049

Members: 16—District No. 5

MORGAN COUNTY

President: T. R. Wilson

814 W. State St., Jacksonville 62650

Secretary: Robert H. Kooiker

801 Lincoln Ave., Jacksonville 62650

Members: 44—District No. 6

MOULTRIE COUNTY

President: H. E. Kendall, Sullivan 61951 Secretary: Dean McLaughlin, Sullivan 61951

Members: 6—District No. 7

OGLE COUNTY

President: Warren Duane Dodd 226 Blackhawk Dr., Bryan 61010

Secretary: Roger Hofmeister 102 Kable Sq., Mt. Morris 61054

Members: 21—District No. 1

PEORIA COUNTY

President: Robert S. Easton

427 First Nat'l. Bank Bldg., Peoria 61602

Secretary: Paul R. Dirkse

427 First Nat'l. Bank Bldg., Peoria 61602

Executive Secretary: David W. Meister 427 First Nat'l. Bank Bldg., Peoria 61602

Members: 239—District No. 4

PERRY COUNTY

President: J. J. Weinberg

2161/2 E. Main, DuQuoin 62832

Secretary: Bill R. Fulk

2171/2 Main, DuQuoin 62832

Members: 14—District No. 10

PIATT COUNTY

President: George Green

340 N. State St., Monticello 61856

Secretary: Joseph Allman

121 N. State St., Monticello 61856

Members: 9—District No. 7

PIKE COUNTY

President: B. J. Rodriquez 880 Banbridge, Barry 62312 Secretary: Thomas C. Bunting

321 W. Washington, Pittsfield 62363

Members: 12—District 6

PULASKI COUNTY

President: James Conger, Mounds 62964 Secretary: Alphonso Robinson, Mounds 62964

Members: 2—District No. 10

RANDOLPH COUNTY

President: John R. Beck, 840 State St. Chester

Secretary: C. S. Schlageter 101 N. Market, Sparta 62286 Members: 15—District No. 10

RICHLAND COUNTY

President: James Landis 426 Whittle, Olney 62450 Secretary: John Spangler 600 E. Main St., Olney 62450 Members: 24—District No. 8

ROCK ISLAND COUNTY

President: J. N. Bourque

464 17th Ave., East Moline 61244

Secretary: W. A. Herath 1410 7th St., Moline 61265 Members: 136—District No. 4

St. CLAIR COUNTY

President: Matthew B. Eisele 4825 Main St., Belleville 62223

Secretary: Charles Frazer
4825 Main St., Belleville 62223
Executive Secretary: Gene Conrad
4825 Main St., Belleville 62223
Members: 167—District No. 10

Saline-Pope-Hardin County President: C. J. Hauptmann

203 N. Vine St., Harrisburg 69246 Secretary: William R. Durham 203 N. Vine St., Harrisburg 69246 Members: 20—District No. 9

SANGAMON COUNTY

President: H. S. Dickerman

100 W. Miller, Springfield 62702

Secretary: David B. Lewis

Memorial Hospital, Springfield 62705

Members: 186—District No. 5

SCHUYLER COUNTY

President: V. M. Corman, Rushville 62681

Secretary: Henry C. Zingher Rushville Clinic, Rushville 62681 Members: 5—District No. 4

SHELBY COUNTY

President: Richard Jones, Cowden 62422 Secretary: Smith D. Taylor, Windsor 61957

Members: 15-District No. 7

Stephenson County
President: G. D. Fish

1683 Middlebury Rd., Freeport 61032

Secretary: W. C. Katel

222 W. Exchange, Freeport 61032

Members: 40-District No. 1

Tazewell County
President: Adam Slaw

427 First Nat'l. Bank Bldg., Peoria 61602

Secretary: Erik Maran

427 First Nat'l. Bank Bldg., Peoria 61602 Executive Secretary: David W. Meister 427 First Nat'l. Bank Bldg., Peoria 61602

Members: 44—District No. 5

Union County

President: William H. Whiting Box 410, Anna 62906 Secretary: William H. Whiting Box 410, Anna 62906 Members: 10—District No. 10

VERMILION COUNTY

President: J. J. Walsh

715 W. Fairchild, Danville 61833

Secretary: L. W. Tanner

7 N. Virginia, Danville 61832 Members: 87—District No. 8

WABASH COUNTY

President: R. A. Richey, Grayville 62844

Secretary: C. L. Johns

114 W. Fifth, Mt. Carmel 62863

Members: 5-District 9

WARREN COUNTY

President: Russell Jensen 319 S. Main, Monmouth 61462 Secretary: Glenn Chamberlin 219 E. Euclid, Monmouth 61462

Members: 13-District No. 4

WASHINGTON COUNTY

President: Peter Fajans, Okawville 62271

Secretary: W. P. Lesko

112 N. Mill, Nashville 62263

Members: 7-District No. 10

WAYNE COUNTY

President: A. R. Marks 101 E. Center, Fairfield 62837 Secretary: D. A. Gershenson

308 E. Main, Fairfield 62837

Members: 8-District No. 9

WHITE COUNTY

President: R. C. Brown

Carmi Medical Group, Carmi 62821 Secretary: J. G. Harrell, Carmi 62821

Members: 8—District No. 9

WHITESIDE COUNTY

President: Edgar Picken

101 E. Miller Rd., Sterling 61081

Secretary: Saul Parks

1601 First Ave., Sterling 61080 Members: 44—District No. 2

WILL-GRUNDY COUNTY

President: Nicholas P. Primiano 108 Scott St., Joliet 60431 Secretary: John W. Bowden

330 N. Madison Ave., Joliet 60435 Executive Director: Robert Best 305 N. Ottawa St., Joliet 60435

Members: 167-District No. 11

WILLIAMSON COUNTY

President: H. G. Diettrich 121 W. Cherry, Herrin 62948

Secretary: Herbert V. Fine

110 N. Division, Carterville 62918

Members: 25—District No. 9

WINNEBAGO COUNTY
President: Franklin A. Munsey
1429 Myott Ave., Rockford 61101

Secretary: John R. West

6670 E. State St., Rockford 61108

Executive Administrator: Donald A. Westbrook 310 N. Wyman St., Rockford 61101

Members: 249-District No. 1

WOODFORD COUNTY

President: J. W. Riley, Eureka 61530

Secretary: Victor Jay

601 N. Jefferson, Washburn 61570

Members: 14—District No. 2

No Organized Society

Brown Johnson Marshall

Putnam Scott

JOINT COUNTY SOCIETIES

Coles-Cumberland

Henry-Stark

Jefferson-Hamilton

Jersey-Calhoun

Saline-Pope-Hardin

TERM

Will-Grundy

TRUSTEE DISTRICT COMMITTEES

MAP OF TRUSTEE DISTRICTS

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First District

Carl E. Clark, Sycamore, Trustee

TERM

Counties of Boone, Carroll, DeKalb, Jo Daviess, Kane, Lake, McHenry, Ogle, Stephenson, Winnebago

Benjamin F. Shirer, Chairman, Batavia	PREPAYMENT PLANS & ORGANIZATIONS EXPIRES Kenneth L. Morris, Chairman 1616 Grand Ave., Waukegan 60085
Second District George E. Giffin, Princeton, Trustee Counties of Bureau, LaSalle, Lee, Livingston, Marshall, Putnam, Whiteside, Woodford ETHICAL RELATIONS COMMITTEE Dexter Nelson, Chairman, Princeton 1968 Ralph Bailey, Ottawa 1969 Tim Sullivan, Sterling 1970 GRIEVANCE COMMITTEE K. M. Nelson, Chairman, Princeton 1969 Francis J. Brennan, Utica 1970 Edward-Murphy, Dixon 1968 Philip Terry, Kewanee 1970 PREPAYMENT PLANS & ORGANIZATIONS M. D. Burnstine, Chairman, Sterling 1970 Perry V. Hartman, Granville 1968	Fourth District Paul P. Youngberg, Moline, Trustee Counties of Fulton, Hancock, Henderson, Henry, Knox, McDonough, Mercer, Peoria, Rock Island, Schuyler, Stark, Warren ETHICAL RELATIONS COMMITTEE John Bowman, Chairman, Abingdon

Third District

William E. Adams, Chicago, *Trustee*J. Ernest Breed, Chicago, *Trustee*James B. Hartney, Oak Park, *Trustee*

Frank J. Jirka, River Forest, *Trustee* William M. Lees, Lincolnwood, *Trustee* Warren W. Young, Chicago, *Trustee*

No district committees are appointed

Fifth District Darrell H. Trumpe, Springfield, Trustee Counties of DeWitt, Logan, McLean, Mason, Menard, Montgomery, Sangamon, Tazewell TERM	Seventh District Arthur F. Goodyear, Decatur, Trustee Counties of Bond, Christian, Clay, Clinton, Effingham, Fayette, Macon, Marion, Moultrie, Piatt and Shelby
ETHICAL RELATIONS COMMITTEE EXPIRES Arthur Conklin, Chairman 219 N. Main St., Bloomington	ETHICAL RELATIONS COMMITTEE EXPIRES Max Hirschfelder, Chairman, Centralia 1968 E. H. Rames, 210 So. 5th St., Vandalia 1969 Carl L. Sandburg 868 Citizens Bldg., Decatur
GRIEVANCE COMMITTEE Clifford Draper, Chairman, Hillsboro	GRIEVANCE COMMITTEE Karl D. Venters, Chairman, Centralia 1970 Boyd McCracken, Greenville 1968 William Sargent, Effingham
J. G. Meyer, Jr., Chairman 413 W. Monroe St., Springfield	PREPAYMENT PLANS & ORGANIZATIONS Clarence Glenn, Chairman 148 N. Edward St., Decatur
Sixth District Mather Ffeiffenberger, Alte Counties of Adams, Brown Jersey, Macoupin, Madi	
ETHICAL RELATIONS COMMITTEE Leo R. Green, chairman 1114 Milton Rd., Alton	Robert C. Murphy 1416 Maine St., Quincy
W. W. Bowers 1820 Delmar St., Granite City	620 N. Main St., Carrollton
Edward K. DuVivier, 1900 Brown St., Alton 1968	1515 W. Walnut St., Jacksonville 1969
Eighth District William H. Schowengerdt, Champaign, Trustee Counties of Champaign, Clark, Coles, Crawford, Cumberland, Douglas, Edgar, Jasper, Lawrence, Richland, Vermilion	Ninth District Charles K. Wells, Mt. Vernon, Trustee Counties of Edwards, Franklin, Gallatin, Hamilton, Hardin, Jefferson, Johnson, Massac, Pope, Saline, Wabash, Wayne, White, Williamson
ETHICAL RELATIONS COMMITTEE Mack W. Hollowell, Chairman 35 Circle Dr., Charleston	ETHICAL RELATIONS COMMITTEE G. R. Johnson, Chairman, Harrisburg 1968 John P. Pope, Benton
GRIEVANCE COMMITTEE	0 0

GRIEVANCE COMMITTEE

C. J. Jannings, Chairman, Fairfield 1970

Andrew Krajec, West Salem 1968

Denton Ferrell, Chairman, Eldorado 1968

A. Watson Miller, Herrin 1969

PREPAYMENT PLANS & ORGANIZATIONS

A. R. Brandenberger, Chairman

George T. Mitchell

PREPAYMENT PLANS & ORGANIZATIONS

605 N. Logan Ave., Danville 1968

James W. Landis, Chairman, Olney 1968

Tenth District	Eleventh District
Willard C. Scrivner, East St. Louis, Trustee	Joseph R. O'Donnell, Glen Ellyn, Trustee
Counties of Alexander, Jackson, Monroe, Perry,	Counties of DuPage, Ford, Grundy, Iroquois,
Pulaski, Randolph, St. Clair, Union, Washing-	Kankakee, Kendall, Will
ton Term	TERM
ETHICAL RELATIONS COMMITTEE EXPIRES William Borgsmiller Chairman	Expires
William Borgsmiller, Chairman Murphysboro1969	ETHICAL RELATIONS COMMITTEE
Harold McCann	Donald A. Meier, Chairman
2720 State St., East St. Louis	555 S. Schuyler Ave., Kankakee 1969
A. L. Robinson, Mounds	Lawrence D. Lee, Manhattan
GRIEVANCE COMMITTEE	Barry S. Seng
William H. Walton, Chairman	219 Bedford St., Morris, 60450 1968
109 South High St., Belleville 1969	GRIEVANCE COMMITTEE
William H. Whiting, Anna	William C. Perkins, Chairman
George Cutridge P.O. Box 149, DuQuoin 1970	123 Galena St., West Chicago 1970
PREPAYMENT PLANS & ORGANIZATIONS	Samuel J. Goldhaber
R. W. Jost, Chairman	28 N. Joliet St., Joliet
107 E. 4th St., Waterloo	R. Kent Swedlund, Watseka
R. E. Schettler, Red Bud	PREPAYMENT PLANS & ORGANIZATIONS
Joseph A. Petrazio	Chas. Allison, Chairman
18 N. 11th St., Murphysboro 1970	1309 E. Court St., Kankakee 1969
	James E. Dailey
DELEGATES TO THE	845 S. Fourth St., Watseka
	J. M. Stoker, 172 Schiller, Elmhurst 1968
AMERICAN MEDICAL	James Lambert
ASSOCIATION	1000 W. Jefferson St., Joliet1970
Elected May 19, 1965	
(Jan. 1, 1966 to Dec. 31, 1967)	
H. KENNETH SCATLIFF	
1415 Greenleaf Ave., Chicago	ALTERNATE DELEGATES
WALTER C. BORNEMEIER	TO THE AMERICAN
4665 Peterson Ave., Chicago	
FRANK H. FOWLER	MEDICAL ASSOCIATION
6356 Diversey Ave., Chicago	Elected May 19, 1965
ARTHUR F. GOODYEAR 142 E. Prairie St., Decatur	(Jan. 1, 1966 to Dec. 31, 1967)
HARLAN ENGLISH	Harold A. Sofield, 715 Lake St., Oak Park
909 N. Logan Ave., Danville	George C. Turner, 6627 Ponchartrain Ave.,
EDWARD W. CANNADY	Chicago
4601 State St., East St. Louis	Edward A. Piszczek, 6410 N. Leona Ave., Chicago
Elected May 18, 1966	Newton DuPuy, 1101 Maine St., Quincy
(To serve from Jan. 1, 1967 to Dec. 31, 1968)	Joseph R. Mallory, Link Clinic, Mattoon
MAURICE M. HOELTGEN	Carl E. Clark, Sycamore
1836 W. 78th St., Chicago	Elected May 18, 1966
LEO P. A. SWEENEY	(Jan. 1, 1967 to Dec. 31, 1968)
2658 W. 95th St., Chicago	Theodore R. Van Dellen, 435 N. Michigan Ave.,
H. CLOSE HESSELTINE	Chicago
5807 S. Dorchester Ave., Chicago	Allison L. Burdick, Sr., 5906 W. North Ave.
WILLIAM K. FORD	Chicago
303 N. Main St., Rockford	Arkell M. Vaughn, 2015 E. 79th St., Chicago Paul A. Dailey, 620 N. Main St., Carrollton
JACOB E. REISCH	Fred C. Endres, 229 E. Glen Ave., Peoria
1129 S. 2nd St., Springfield	
Elected May 24, 1967	Elected May 24, 1967
(Jan. 1, 1968 to Dec. 31, 1969) H. KENNETH SCATLIFF	(Jan. 1, 1968 to Dec. 31, 1969)
WALTER C. BORNEMEIER	Harold A. Sofield
FRANK H. FOWLER	George C. Turner Edward A. Piszczek
- ALLIE II. I O II LUN	Edward A. HISECECK

Newton DuPuy

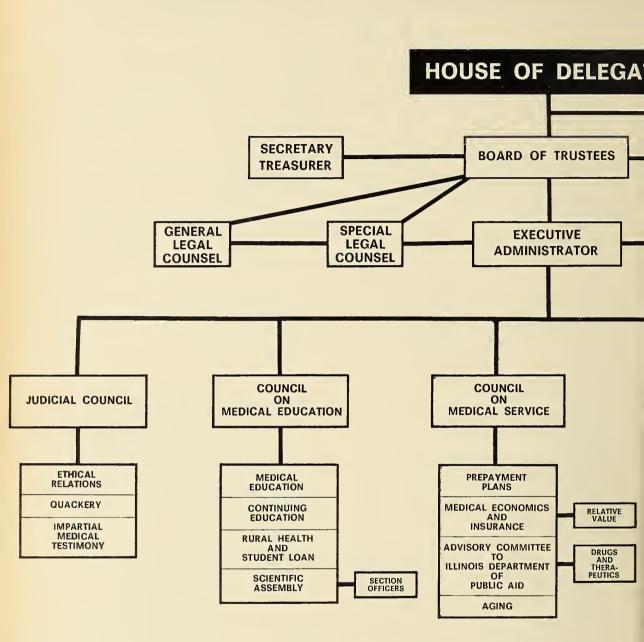
Carl E. Clark

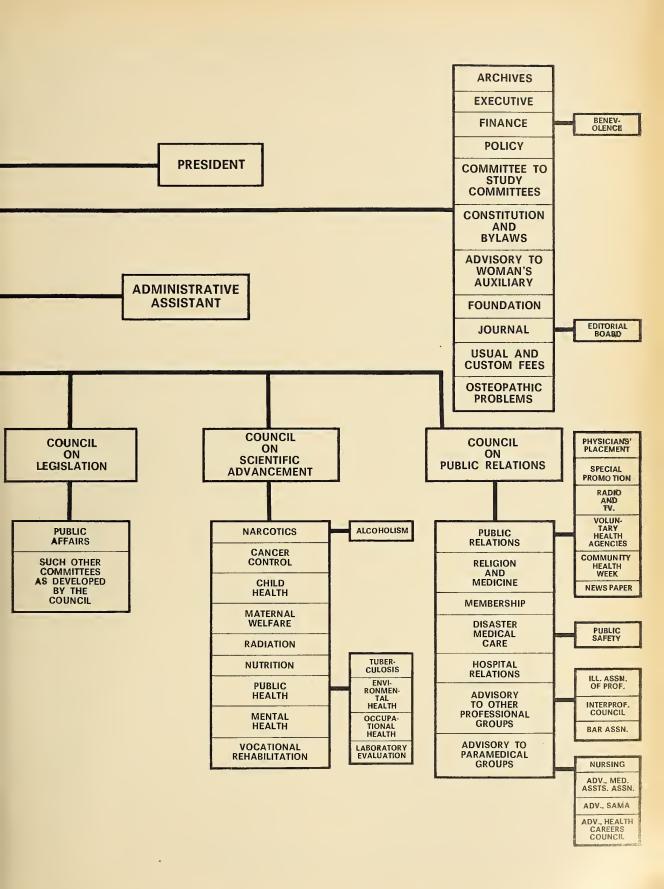
Joseph R. Mallory

FRANK H. FOWLER ARTHUR F. GOODYEAR

HARLAN ENGLISH

EDWARD W. CANNADY





Councils of the Illinois State Medical Society

Committees of the Illinois State Medical Society are appointed by the Board of Trustees and are assigned to one of six councils which report directly to the Board. Councils are composed, for the most part, of committee chairmen.

JUDICIAL COUNCIL

Noel G. Shaw, Chairman 2901 Central St., Evanston 60201 Clinton Compere (Impartial Medical Testimony) 737 N. Michigan Ave., Chicago 60611 Edward A. Piszczek (Quackery)

6410 N. Leona St., Chicago 60646

William H. Walton

109 S. High St., Belleville 62220

CONSULTANTS:

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Willard C. Scrivner

4601 State St., East St. Louis 62205

STAFF: George F. Lull

COUNCIL ON LEGISLATION AND PUBLIC AFFAIRS

V. P. Siegel, Chairman 4601 State St., East St. Louis 62205

Paul Richard Allyn

107 S. 5th St., Springfield 62701

Alfred J. Faber

2110 Swainwood Dr., Glenview

Theodore Grevas

1800 Third Ave., Rock Island 61201

C. J. Jannings, III

101 E. Center St., Fairfield 62837

Eugene J. Scherba

13826 Lincoln Ave., Dolton 60419

CONSULTANTS:

J. Ernest Breed

55 E. Washington St., Chicago 60602

H. Close Hesseltine

5807 S. Dorchester Ave., Chicago 60637

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Harold A. Sofield

715 Lake St., Oak Park 60301

AUXILIARY REPRESENTATION:

Mrs. Alan Taylor

1607 N. Vermilion St., Danville 61833

STAFF: Roger White

COUNCIL ON MEDICAL EDUCATION

Jack Gibbs (Rural Health & Student

Loan Fund), Chairman

24 Main St., Canton 61520

Robert T. Fox (Scientific Assembly)

2136 Robin Crest Lane, Glenview 60025

Robert J. Freeark (Continuing Education)

1825 W. Harrison St., Chicago 60612

Coye E. Mason (Director of Exhibits)

2052 N. Orleans St., Chicago 60614

Morgan M. Meyer (Medical Education)

573 So. Lombard, Lombard 60148

STAFF: Perry Smithers

COUNCIL ON MEDICAL SERVICE

Philip C. Lynch (Prepayment Plans), Chairman 1314 N. Main St., Decatur 62526

Bertram B. Moss (Aging)

5360 N. Lincoln Ave., Chicago 60625

Fred A. Tworoger (Adv. to IDPA)

4753 Broadway, Chicago 60640

Fred Z. White (Medical Economics & Insurance)

723 N. 2nd St., Chillicothe 61523

STAFF: James Slawny

COUNCIL ON PUBLIC RELATIONS

Max Klinghoffer (Disaster Medical

Care), Chairman

127 E. Vallette St., Elmhurst 60126

Julian W. Buser (Hospital Relations)

4601 State St., East St. Louis 62205

Matthew B. Eisele (Public Relations) 4601 State St., East St. Louis 62205

James D. Majarakis (Adv. to Other

Professional Groups)

30 N. Michigan Ave., Chicago 60602

Robert S. Mendelsohn (Religion and Medicine)

411 Briar Pl., Chicago 60614

Joseph F. O'Malley (Membership)

6 N. Michigan Ave., Chicago 60602

W. I. Taylor (Adv. to Paramedical Groups)

28 N. Main St., Canton 61520

CONSULTANT:

Leo P. A. Sweeney

2658 W. 95th St., Evergreen Park 60642

STAFF: James Slawny

COUNCIL ON SCIENTIFIC ADVANCEMENT

Joseph H. Skom (Narcotics), Chairman 707 N. Fairbanks Ct., Chicago 60611

John R. Adams (Mental Health)

707 N. Fairbanks Ct., Chicago 60611

Henry B. Betts (Rehabilitation Services)

1511 N. State Pkwy., Chicago 60611

Howard C. Burkhead (Radiation)

2650 Ridge Ave., Evanston 60201

Paul A. Dailey (Nutrition)

620 N. Main St., Carrollton 62016

T. P. deGraffenried (Public Health)

1208 Sunnymeade, DeKalb 60115

Robert Hartman (Maternal Welfare)

1515A W. Walnut St., Jacksonville 62650

Ralph H. Kunstadter (Child Health)

664 N. Michigan Ave., Chicago 60611

Thomas Sellett (Cancer Control)

101 E. Miller Rd., Sterling 61081

STAFF: Perry Smithers

COMMITTEES

The following committees have been appointed for the year, 1967-68. Each committee is assigned to a council for reporting purposes, except those that are composed entirely of trustees, or for reasons of efficiency and control, report directly to the Board of Trustees.

COMMITTEE ON AGING (Council on Medical Service)

Bertram B. Moss, Chairman 5360 N. Lincoln Ave., Chicago 60625

Edward E. Gordon

Michael Reese Hospital, 29th and Ellis Ave., Chicago 60616

John H. Huss

172 Schiller St., Elmhurst 60126

Alan Olson

130 W. Center St., Paxton 60957

Clyde Rulison

Roberts 60962

Roger F. Sondag

518 State Office Bldg., Springfield 62706

Thomas T. Tourlentes

Galesburg Research Hospital, Galesburg 61401 Consultants:

ONSULTANTS:

Edward W. Cannady

4601 State St., East St. Louis 62205

William K. Ford

303 N. Main St., Rockford 61101

Auxiliary Representation:

Mrs. Howard A. Lowy

112 Pekin Ave., East Peoria 61611

STAFF: Miss Gaylen Lair

Responsibilities and Purposes

The functions of the Committee on Aging encompass the board field of aging with special consideration for the types of medical services and patterns of care available to the aging and the economics involved; promotion of positive health and meaningful living through sound living habits, periodic health supervison, and full use of human potentials, regardless of age. The committee cooperates with the American Medical Association's Committee on Aging and other appropriate agencies.

Included among the committee's activities are the study and support of expansion of additional home care programs in Illinois; relationships with nursing homes, home nursing, homemaker programs, and other programs involving services oriented toward the aging; emphasizing preretirement planning; discouraging the mandatory retirement age and arbitrary age limits for employment whether the individual wants to continue working or not; and liaison with other agencies having a similar interest.

SUB-COMMITTEE ON ALCOHOLISM (See Committee on Narcotics)

ARCHIVES COMMITTEE (Board of Trustees)

Emmet F. Pearson, Chairman
701 N. Walnut St., Springfield 62702
Carl W. Hagler
1101 Maine St., Quincy 62301
H. Kenneth Scatliff
1415 Greenleaf Ave., Chicago
Leo Zimmerman
55 E. Washington St., Chicago 60602
STAFF: Mel Sloan

Responsibilities and Purposes

Assist in the collection and evaluation of medical items and records of historical interest to the society and the public; cooperate with other associations and agencies to preserve and display such material; supervise the preparation of any written records of the society or any of its activities, and inform the Board of Trustees of those special anniversaries which should be commemorated and shall supervise the observance of these occasions.

SUB-COMMITTEE ON BENEVOLENCE (See Finance Committee)

COMMITTEE ON CANCER CONTROL (Council on Scientific Advancement)

Thomas Sellett, Chairman

101 E. Miller Rd., Sterling 61081

Kent W. Barber

1416 Maine St., Quincy 62301

Michael H. Boley

2333 N. Cleveland Ave., Chicago 60614

Robert E. Field

13000 S. Maple Ave., Blue Island 60406

Russell M. Jensen

319 N. Main St., Monmouth 61462

Roland A. Kowal

505 S. Oak Park Ave., Oak Park 60304

R. G. Mrazek

3237 S. Oak Park Ave., Berwyn 60403

Wilson R. Scott

Clinic Drive, New Rt. 13 W., Carbondale 62901

Caesar Sweitzer

251 E. Chicago Ave., Chicago 60611

Andrew J. Toman

6738 Cermak Rd., Berwyn 60402

CONSULTANTS:

J. Ernest Breed

55 E. Washington St., Chicago 60602

Caesar Portes

25 E. Washington St., Chicago 60602

AUXILIARY REPRESENTATION:

Mrs. Richard Icenogle

Box 188, Roseville 61473

STAFF: Perry Smithers

Responsibilities and Purposes

This committee shall serve as a source of information on cancer matters for the ISMS. It shall evaluate available information and make recommendations to the Board of Trustees on the position the ISMS should take in this area of scientific endeavor. It shall cooperate with institutions and voluntary health agencies in disseminating information on cancer subjects to the profession and to the public. It shall be on the alert for misleading or fallacious programs and information which need correction for the protection of the public.

COMMITTEE ON CHILD HEALTH (Council on Scientific Advancement)

Ralph H. Kunstadter, Chairman

664 N. Michigan Ave., Chicago 60611

Irving Abrams

6342 N. Sheridan Rd., Chicago 60626

William J. Ball

143 S. Lincoln Ave., Aurora 60505

Oliver W. Crawford

3233 S. Park Ave., Chicago 60616

Eugene F. Diamond

11055 S. St. Louis Ave., Chicago 60655

Richard E. Dukes

602 W. University Pl., Urbana 61802

Arthur W. Fleming

10400 S. Western Ave., Chicago 60643

W. W. Fullerton

101 N. Market St., Sparta 62286

Edmond R. Hess

1737 W. Howard St., Chicago 60626

H. R. Hone

3340 S. Oak Park Ave., Berwyn 60402

Eduard Jung

13826 Lincoln Ave., Dolton 60419

Edward F. Lis

840 S. Wood St., Chicago 60612

Fred Long

2116 N. Sheridan Rd., Peoria 61604

J. Keller Mack

922 S. 4th St., Springfield 62703

Franklin A. Munsey

1429 Myott Ave., Rockford 61101

Kenneth S. Nolan

172 Schiller St., Elmhurst 60126

T. A. Palus

101 Orchard Terr., Lombard 60148

Leo G. Perucca

602 W. University Pl., Urbana 61802

Ira M. Rosenthal

840 S. Wood St., Chicago 60612

Norman T. Welford

656 - 58th St., Hinsdale 60521

Walter M. Whitaker

1416 Maine St., Quincy 62301

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall serve as a source of information on matters pertaining to child health. It shall evaluate available information and make recommendations to the Board of Trustees for the position the ISMS should take on issues in this area and cooperate with institutions and voluntary health agencies in disseminating information pertinent to general child health. It shall be on the alert for misleading or fallacious programs and information which need correction for the protection of the public. It shall conduct educational programs for public enlightenment for the encouragement and the establishment of school health councils; and strive for increased services for exceptional children. It shall conduct, in cooperation with the Maternal Welfare Committee, research on neonatal mortality through the state; and seek the formulation and adoption of uniform school health records.

COMMITTEE TO STUDY COMMITTEES (Board of Trustees)

William H. Schowengerdt, Chairman 301 E. University Ave., Champaign 61821 Joseph R. O'Donnell 444 Park Ave., Glen Ellyn 60137 Darrell H. Trumpe St. John's Sanatorium, Springfield 62707 Charles K. Wells

117 N. 10th St., Mt. Vernon 62824 Warren W. Young

10816 Parnell Ave., Chicago 60628

STAFF: Frances C. Zimmer

Responsibilities and Purposes

This committee is composed of trustees appointed for a term of one year by the Chairman of the Board of Trustees. Its duties include an annual review of the society's committee structure and recommendations to the board for maintaining efficiency of the system. The committee's annual report to the House of Delegates is a part of the report of the chairman of the board.

COMMITTEE ON CONSTITUTION & BYLAWS (Board of Trustees)

Andrew J. Brislen, *Chairman* 6060 S. Drexel Blvd., Chicago 60637

David S. Fox 826 E. 61st St., Chicago 60637

Wayne N. Leimbach 370 L.R.A. Dr., Aurora 60506

Carl Weissmann

1508 - 7th St., Moline 61265 STAFF: Frances C. Zimmer

Responsibilities and Purposes

The committee shall receive from individual members, county societies, committees, the Board of Trustees and the House of Delegates, all suggestions and proposals for the modification of the Constitution and/or Bylaws; prepare for the consideration of the House of Delegates all changes in the Constitution or Bylaws, and maintain surveillance of both documents to keep them current, effective and consistent with policies of the House of Delegates.

COMMITTEE ON CONTINUING EDUCATION (Council on Medical Education)

Robert J. Freeark, *Chairman*Cook County Hospital, 1825 W. Harrison St.,
Chicago 60612

Hubert Allen

1312 Delmar Ave., Godfrey 62035

W. W. Bowers

1820 Delmar Ave., Granite City 62040

T. Howard Clarke

251 E. Chicago Ave., Chicago 60611

Louis N. Katz

Cardiovascular Institute, Michael Reese Hospital, 2929 S. Ellis Ave., Chicago 60616

John L. Keeley

PO Box 1336, Hines 60141

Louis P. Limarzi

910 N. East Ave., Oak Park 60302

Edward S. Petersen

303 E. Chicago Ave., Chicago 60611

Gordon S. Sprague

502 Shaw Ave., Paris 61944

William R. Thompson

1640 Dartmouth Lane, Deerfield 60015

CONSULTANT:

William E. Adams

55 E. Erie St., Chicago 60611

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall provide a program of continuing education for the practicing physicians of Illinois. This shall include courses in specific medical subjects as requested by component societies as well as speakers on scientific subjects. The committee shall solicit individuals or teams from the medical schools in Illinois, the hospitals and research centers and the body of practitioners to present this program of continuing education. It shall study more effective means of presenting educational material throughout the state. It shall provide additional services to component societies as are deemed necessary to the conduct of an effective program.

COMMITTEE ON DISASTER MEDICAL CARE (Council on Public Relations)

Max Klinghoffer, Chairman

127 E. Vallette St., Elmhurst 60126

Jack R. Baldwin

1315 S. 6th St., Springfield 62703

Edwin A. Lee

501 S. 13th St., Springfield 62703

Harold C. Lueth

636 Church St., Evanston 60201

Carl Steinhoff

8909 Kilpatrick Ave., Skokie 60076

John Taylor

404 W. Main St., Carbondale 62901

CONSULTANT:

James Hartney

410 Lake St., Oak Park 60301

STAFF: Gary Kennon

Responsibilities and Purposes

The committee shall be responsible for assisting in the education of the profession and the public on the development and implementation of programs to provide medical care in the event of disaster; be responsible for directing the society's efforts toward preparedness in the event of natural or man-made catastrophes; cooperate with civil defense agencies, public health departments, hospitals, management and labor organizations, paramedical groups and other agencies to establish unity and coordination, and serve in an advisory capacity

to county medical societies in medical self-help training programs and hospital disaster planning.

COMMITTEE ON PUBLIC SAFETY (Sub-Committee, Disaster Medical Care)

Edwin A. Lee, Chairman

501 S. 13th St., Springfield 62703

James P. Campbell

322 N. Blanchard St., Wheaton 60187

Julius M. Kowalski

436 Park Ave. East. Princeton 61356

Norman J. Rose

400 S. Spring St., Springfield 62706

Clifford P. Sullivan

2800 W. 87th St., Chicago 60652

AUXILIARY REPRESENTATION:

Mrs. Don Morehead

1447 Birchlawn, Ottawa 61350

STAFF: Gary Kennon Responsibilities and Purposes

The Committee shall study the medical aspects of accident prevention; alert the public to seasonal health hazards, and co-operate with the Illinois Department of Public Health, the National Safety Council and similar organizations. It shall function as a sub-committee of the Committee on Disaster Medical Care.

SUB-COMMITTEE ON DRUGS AND THERAPEUTICS (See Advisory Committee to The Illinois Department of Public Aid)

EDITORIAL BOARD (See Journal Committee)

EDUCATIONAL & SCIENTIFIC FOUNDATION (Board of Trustees)

Caesar Portes, Chairman

25 E. Washington St., Chicago 60602

Newton DuPuy

1101 Maine St., Quincy 62301

Arthur F. Goodyear

142 E. Prairie Ave., Decatur 62523

Jacob E. Reisch

1129 S. 2nd St., Springfield 62704

STAFF: Perry Smithers

Responsibilities and Purposes

The foundation was founded to provide an administrative agency to foster the advancement of

medical science through (1) the initiation of scientific and medical research activities, (2) the collection, evaluation and dissemination of the results of research activities to the public and (3) the implementation and management of projects related to medicine for individuals or organizations seeking to inform or educate others, or to improve their own knowledge. The charter of the foundation calls for a board of directors consisting of the following officers of the Illinois State Medical Society: Immediate Past President (as chairman), Chairman of the Board of Trustees, President, and Secretary-Treasurer.

SUB-COMMITTEE ON ENVIRONMETAL HEALTH (See Committee on Public Health)

ETHICAL RELATIONS COMMITTEE (Judicial Council)

Willard C. Scrivner, *Chairman* 4601 State St., East St. Louis 62205

J. Ernest Breed

55 E. Washington St., Chicago 60602

George E. Giffin

203 Park Ave., E., Princeton 61356

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

STAFF: George F. Lull

Responsibilities and Purposes

The duties of this committee are outlined in detail in the Bylaws under the chapter on "Discipline."

SUB-COMMITTEE ON DRUGS & THERAPEUTICS (See Advisory Committee to the Illinois Department of Public Aid)

EXECUTIVE COMMITTEE (Board of Trustees)

Arthur F. Goodyear, *Chairman* 142 E. Prairie Ave., Decatur 62523

William E. Adams

55 E. Erie St., Chicago 60611

Carl E. Clark

225 Edward St., Sycamore 60178

Newton DuPuy

1101 Maine St., Quincy 62301

Caesar Portes

25 E. Washington St., Chicago 60602

Jacob E. Reisch

1129 S. 2nd St., Springfield 62704

Philip G. Thomsen

13826 Lincoln Ave., Dolton 60419

LEGAL COUNSEL:

John W. Neal

Frank M. Pfeifer

STAFF: George F. Lull

Frances C. Zimmer

Responsibilities and Purposes

The Executive Committee shall consist of the president, the president-elect, the chairman of the Board of Trustees, the chairman of the Finance Committee, the chairman of the Policy Committee, the secretary-treasurer, and the trustee-at-large. It may be given authority to act by the Board of Trustees. In matters of routine administration, special plans, policy, endorsement or expenditure, it shall report to and request approval of the board. It shall receive the reports of the Finance and Policy committees and make recommendations concerning them to the board. It shall furnish a report of its actions to the board at each meeting.

FINANCE COMMITTEE (Board of Trustees)

Carl E. Clark, Chairman
225 Edward St., Sycamore 60178
William M. Lees
7000 N. Kenton Ave., Lincolnwood 60646
Mather Pfeiffenberger
State & Wall Sts., Alton 62002
Jacob E. Reisch
1129 S. 2nd St., Springfield 62704
LEGAL COUNSEL:
John W. Neal
Frank M. Pfeifer

Responsibilities and Purposes

STAFF: George F. Lull

Roland I. King

The Finance Committee shall consist of the secretary-treasurer of the society and three members of the board appointed by the chairman. It shall develop for approval of the board through the Executive Committee, a budget for the fiscal year. It shall supervise the financial transactions of the society. It shall make recommendations to the board for the control and investment of the funds of the Illinois State Medical Society.

SUB-COMMITTEE ON BENEVOLENCE

Keith H. Frankhauser, Chairman

Avon 61415

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Raleigh C. Oldfield

203 N. Kenilworth Ave., Oak Park 60302

AUXILIARY REPRESENTATION:

Mrs. Sherman C. Arnold

2416 Bookwood Dr., Flossmoor 60422

STAFF: George F. Lull

Responsibilities and Purposes

The committee shall examine applications to the society for assistance to determine eligibility for benefits; keep the names of the beneficiaries confidential and known only to the committee, and recommend to the Finance Committee of the Board of Trustees the allotment for each recipient. It shall operate as a sub-committee of the Finance Committee.

If funds available become inadequate to meet disbursements, the Finance Committee of the Board of Trustees shall be requested to appropriate sufficient funds to support the program until the next budget appropriation.

SUB-COMMITTEE ON HEALTH CAREERS COUNCIL OF ILLINOIS (See Advisory Committee to Paramedical Groups)

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(Council on Public Relations)

J. W. Buser, Chairman

4601 State St., East St. Louis 62205

John A. Bowman

300 N. Main St., Abingdon 61410

Harlan English

909 N. Logan Ave., Danville 61832

909 N. Logan . Donald A. Meier

555 S. Schuyler, Kankakee 60901

Kenneth John Smith

2320 High St., Blue Island 60406

CONSULTANTS:

Noel G. Shaw

2901 Central St., Evanston 60201

STAFF: James Slawny Responsibilities and Purposes

Among the functions of the committee are the

consideration of all problems bearing on the relationship between physicians and hospitals except those pertaining to medical training. A prime objective of the committee is to encourage hospital staffs to become actively interested in the economics of hospital operation and hospital services. In areas of health insurance, nursing and items requiring legislative action, the committee should coordinate its activities with the respective committees of the society to avoid duplication of effort.

The committee will continue to work toward solving mutual problems pertaining to hospital utilization; medical, nursing and administrative care of patients; hospital costs; accreditation of non-accredited hospitals; and to improve physician-hospital relationships in the interest of patient care

COMMITTEE ON IMPARTIAL MEDICAL TESTIMONY (Judicial Council)

Clinton L. Compere, Chairman

737 N. Michigan Ave., Chicago 60611

R. Gregory Green

1355 Charles St., Rockford 61108

Jerome J. McCullough

110 N. High St., Belleville 62220

Maurice D. Murfin

250 N. Water St., Decatur 62523

CONSULTANTS:

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Samuel A. Levinson

3730 Lake Shore Dr., Chicago 60613

Vincent C. Sarley

811 Wellington Ave., Chicago 60657

STAFF: Mel Sloan

Responsibilities and Purposes

The committee shall cooperate with the judiciary in both federal and state courts within the state of Illinois. It shall, when requested by the court, implement the Impartial Medical Testimony Rule.

JOURNAL COMMITTEE (Board of Trustees)

Jacob E. Reisch, Chairman

1129 S. 2nd St., Springfield 62704

J. Ernest Breed

55 E. Washington St., Chicago 60602

James B. Hartney

410 Lake St., Oak Park 60302

Darrell H. Trumpe

St. John's Sanatorium

Springfield 62707

STAFF: John Kinney

Responsibilities and Purposes

This committee shall be responsible for the production of the *Illinois Medical Journal*. It shall recommend to the Board of Trustees all policies governing the editorial, business and production aspects of the Journal. It shall supervise the editor in the selection and preparation of all copy and it shall establish standards for the editorial content. It shall establish advertising policies, rates, standards and review all new accounts prior to acceptance, and approve reprint and circulation policies. It shall conduct a periodic review of the printer's contract and solicit bids as indicated. It shall establish the format, cover, type faces and general layout of the Journal.

EDITORIAL BOARD
(Sub-Committee of Journal
Committee)

Samuel A. Levinson, Chairman

3730 Lake Shore Dr., Chicago 60613

Edwin F. Hirsch

5830 Stony Island Ave., Chicago 60637

James H. Hutton

67 E. Madison St., Chicago 60603

Charles Mrazek

1210 Robin Hood Lane, LaGrange Park 60525

C. J. Mueller

108 W. 4th St., Sterling 61081

Frederick Steigman

1825 W. Harrison St., Chicago 60612

E. Clinton Texter, Jr.

700 N. Michigan Ave., Chicago 60611

Arkell M. Vaughn

2015 E. 79th St., Chicago 60649

STAFF: Perry Smithers

Responsibilities and Purposes

The responsibilities of this committee lie in the area of the editorial content of the Illinois Medical Journal, and it will function as a sub-committee of the Journal Committee. It shall make recommendations to the editor concerning the scientific content, regular features and subjects of special interest to the members. It shall serve as a review board for manuscripts which the editor believes require special medical evaluation. It shall assist the editor in any way possible to obtain and present medical manuscripts of the highest quality and maximum interest to the physicians of Illinois.

SUB-COMMITTEE ON LABORATORY **EVALUATION**

(See Committee on Public Health)

COMMITTEE ON LEGISLATION (See Council on Legislation and Public Affairs)

COMMITTEE ON MATERNAL WELFARE (Council on Scientific Advancement)

Italics indicate alternates

Robert R. Hartman, Chairman

1515 Walnut St., Jacksonville 62650

Frederick H. Falls

Chairman Emeritus & Special Consultant

P.O. Box 47, River Forest 60305

1. William R. Larsen

13707 W. Jackson St., Woodstock 60098

Hugh C. Falls

711 McKinley Rd., Lake Forest 60045

2. William J. Farley

710 Peoria St., Peru 61354

Lewis J. Foley

204 Park Ave. East, Princeton 61356

3. Melvin Goodman

13826 Lincoln Ave., Dolton 60419

Charles D. Krause 1700 W. 87th St., Chicago 60620

4. V. B. Adams

301 E. Jefferson St., Macomb 61455

Ralph Gibson

1916 N. Knoxville Ave., Peoria 61603

5. William W. Curtis

100 W. Miller St., Springfield 62702 Donald M. Barringer

118 Walnut St., Lincoln 62656

6. Robert R. Hartman

1515 Walnut St., Jacksonville 62650

Hubert L. Allen

1312 Delmar Ave., Godfrey 62035

7. Paul A. Raber

149 W. King St., Decatur 62521

Hubert Magill

1170 E. Riverside, Decatur 62521

8. Jack D. Brodsky

301 E. Springfield Ave., Champaign 61820

George E. Fagan

301 E. Springfield Ave., Champaign 61820

9. Harry L. Lewis

104 S. Maple St., Benton 62812

Donald R. Risley

319 Market St., Mt. Carmel 62863

10. Berry V. Rife 102 Lafavette, Anna 62906 James B. Stotlar

15 N. Walnut St., Pickneyville 62274

11. John J. McLaughlin

1000 Jefferson St., Joliet 60436

Charles P. Westfall

172 Schiller St., Elmhurst 60126

CONSULTANTS:

John Louis

Stritch School of Medicine

Loyola University

706 S. Wolcott Ave., Chicago 60612

Donald F. Rawlings

Department of Public Health

500 State Office Bldg., Springfield 62706

John H. Rendok

502 State Office Bldg., Springfield 62706

Williard C. Scrivner

4601 State St., East St. Louis 62205

Augusta Webster

707 N. Fairbanks Ct., Chicago 60611

Thomas R. Wilson

602 University Ave., Urbana 61801

Franklin D. Yoder

Department of Public Health

503 State Office Bldg.

Springfield 62706

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall cooperate with the State Department of Public Health in reducing the maternal mortality rate in Illinois. As a means of achieving this goal, it shall review all maternal deaths reported and send its evaluation of the management of the case to the attending physician. Appropriate measures should be taken to share the results of this research with those practitioners in a position to apply it for the benefit of their patients.

SUB-COMMITTEE, ADVISORY TO ILLINOIS MEDICAL ASSISTANTS **ASSOCIATION** (See Advisory Committee to Paramedical Groups)

MEDICAL ECONOMICS & INSURANCE (Council on Medical Service)

Frederick Z. White, Chairman

723 N. 2nd St.

Chillicothe 61523

C. Elliott Bell

964-67 Citizen's Bldg.

Decatur

Bille Hennan

8734 S. Cottage Grove Ave.

Chicago 60619

John J. Holland

511 Bondi Bldg.

Galesburg 61401

A. Everett Joslyn, Jr.

557 Keystone Ave.

River Forest 60305

Lawrence J. Knox

600 E. Main St.

Olney 62450

F. Paul LaFata

700 N. 7th St.

Springfield 62702

Dean G. Peterson

204 N. Locust St.

Pontiac 61764

Paul Van Pernis

1316 Charles St.

Rockford 61107

CONSULTANT:

Clifton L. Reeder

310 S. Michigan Ave.

Chicago 60604

STAFF: Marvin Schroder

Responsibilities and Purposes

The functions of the committee shall include its continuing review of the Tax Qualified Investment Program (Keogh); the Retirement Investment Program; the Group Disability Program, and the Group Major Medical Program. The committee shall continue to investigate various insurance programs that may serve to benefit members of the society.

The committee shall continue to assist in the administration of the presently sponsored disability program by performing the adjudication services provided for in the master contract.

Matters having an economic bearing on the practice of medicine, including fact-finding and research studies in the general field of medical economics. shall be brought before this committee for consideration.

This committee shall study insurance plans provided the membership of the Society, and shall make suggestions for changes, additions, and cancellation of policies.

SUB-COMMITTEE ON RELATIVE VALUE

C. Elliott Bell, Chairman

964-67 Citizen's Bldg.

Decatur

John F. Eggers

111 W. Elm St.

Sycamore 60178

Casper Epsteen

25 E. Washington St.

Chicago 60602

R. Gregory Green

1355 Charles St.

Rockford 61108

Gershom K. Greening

701 N. Walnut St.

Springfield 62702

Joseph G. Gustafson

1508 Seventh St.

Moline 61265

STAFF: Miss Gaylen Lair

Responsibilities and Purposes

The functions of this sub-committee of the Committee on Medical Economics and Insurance shall include the responsibility for professional education on the uses of the Relative Value Study; the distribution of the study upon request, and the revision of the Relative Value Study at appropriate intervals to keep it up-to-date. Consultation with specialists in any field is the prerogative of the committee.

COMMITTEE ON MEDICAL EDUCATION (Council on Medical Education)

Morgan M. Meyer, Chairman 815 S. Main St., Lombard 60148

Herschel L. Browns

4600 N. Ravenswood Ave., Chicago 60640

Leonard D. Gravson

1101 Maine St., Quincy 62301

Jerry Ingalls

502 Shaw Ave., Paris 61944

Peter V. Moulder

950 E. 59th St., Chicago 60637

F. H. Riordan III

303 N. Main St., Rockford 61101

James Sours

435 Jefferson Bldg., Peoria 61602

James A. Weatherly 108 N. 14th St., Murphysboro 62966 REPRESENTATIVES OF MEDICAL SCHOOLS:

Chicago Medical School

LeRoy Levitt

710 S. Wolcott Ave., Chicago 60612

Northwestern University

Edward S. Petersen

303 E. Chicago Ave., Chicago 60611

Stritich School of Medicine, Loyola University William Barrett Rich

706 S. Wolcott Ave., Chicago 60612

COMMITTEE ON MEDICAL EDUCATION (Continued)

University of Chicago Robert G. Page

950 E. 59th St., Chicago 60637

University of Illinois

Adrian M. Ostfeld

1853 W. Polk St., Chicago 60612

CONSULTANTS:

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Caesar Portes

25 E. Washington St., Chicago 60602

STAFF: Perry Smithers

Responsibilities and Purposes

This committee shall: (A) maintain a continuing interest in the recruitment of students, in the curricula of the medical schools and in postgraduate in-hospital training programs; (B) carry to the deans of the medical schools recommendations from the viewpoint of the practicing physician; (C) encourage and implement the AMA-ERF program in Illinois; (D) study, evaluate and criticize the postgraduate programs of the Illinois State Medical Society and other organizations, and (E) be available to advise and cooperate with the Department of Registration and Education of the State of Illinois.

MEMBERSHIP COMMITTEE (Council on Public Relations)

Joseph F. O'Malley, Chairman
6 N. Michigan Ave., Chicago 60602
Roger Hoekstra
1530 N. Main St., Wheaton 60187
Fritz Koenig
Catlin 61817
Burton J. Soboroff
307 N. Michigan Ave., Chicago 60601
AUXILIARY REPRESENTATION:
Mrs. Alden Rarick
1810 N. Gilbert Ave., Danville 61832
STAFF: Marvin Schroder

Responsibilities and Purposes

The responsibilities of this committee shall include the development of orientation courses for new members and such other projects as will encourage participation in both county and state medical society activities.

COMMITTEE ON MENTAL HEALTH (Council on Scientific Advancement)

John R. Adams, *Chairman* 707 N. Fairbanks Ct., Chicago 60611

E. Eliot Benezra

103 Haven Rd., Elmhurst 60126

Irving Frank

135 S. Sacramento St., Sycamore 60178

Richard J. Graff

1440 Sunset Lane, Kankakee 60901

John H. McMahan

8601 W. Main St., Belleville 62223

Walter P. Plassman

Box 552, Centralia 62801

CONSULTANT:

Harold M. Visotsky

160 N. LaSalle St., Chicago 60601

AUXILIARY REPRESENTATION:

Mrs. Thomas Tourlentes

Galesburg State Research Hospital

Galesburg 61401

STAFF: Perry Smithers

Responsibilities and Purposes

The responsibilities of this committee are as follows: It shall serve as a source of information on mental health matters for the ISMS. It shall evaluate available information and make recommendations to the Board of Trustees for the position the ISMS should take on issues in this area. It shall also cooperate with institutions and voluntary health agencies in disseminating information on mental health subjects to the profession and the public. It shall be on the alert for misleading or fallacious programs and information which need correcting for the protection of the public.

COMMITTEE ON NARCOTICS & HAZARDOUS SUBSTANCES

(Council on Scientific Advancement)

Joseph H. Skom, Chairman

707 N. Fairbanks Ct., Chicago 60611

Raymond E. Anderson

326 W. Jefferson St., Rockford 61101

Richard Eisenstein

6730 South Shore Dr., Chicago 60649

Edwin Feldman

41 S. Brockway, Palatine 60067

Abraham Gelperin

1853 Polk St., Dept. of Prev. Med.

Room 554, DMP, Chicago 60612

Kermit Mehlinger

4901 S. Drexel Blvd., Chicago 60615

David Slight

25 E. Washington St., Chicago 60602

CONSULTANT:

Paul Swarts

2670 Grosse Pointe Rd., Evanston

STAFF: Mel Sloan

Responsibilities and Purposes

The functions of the Committee on Narcotics & Hazardous Substances are: (1) study, research and dissemination of educational information on narcotics and hazardous substances to members of the medical profession; (2) to recommend acceptable measures for the control of distribution, the use and disposal of narcotics and hazardous substances, exclusive of radiation products but including poison control and (3) to cooperate with official and non-official agencies in all matters pertaining to this subject.

SUB-COMMITTEE ON ALCOHOLISM

Abraham Gelperin, Chairman

Dept. of Preventive Medicine

University of Illinois

1853 W. Polk St., Chicago 60612

Charles L. Anderson

120 N. Oak St., Hinsdale 60521

Richard S. Cook

230 N. Michigan Ave., Chicago 60601

Robert A. Moore

Swedish American Hospital

Rockford 61108

Jackson A. Smith

P.O. Box 1336, Hines 60141

John C. Troxel

425 N. Michigan Ave., Chicago 60690

Frank J. Walsh

6445 W. North Ave., Oak Park 60302

William H. Wehrmacher

670 N. Michigan Ave., Chicago 60611

STAFF: Perry Smithers

Responsibilities and Purposes

The Sub-Committee on Alcoholism serves as a resource on alcoholism for ISMS and evaluates information and makes recommendations to the Board of Trustees for the position ISMS should take on issues in this area. It cooperates with institutions, industry, government and health agencies in disseminating information on the causes, prevention, diagnosis and treatment of alcoholism to the medical profession and the public. It is a subcommittee of the Committee on Narcotics and Hazardous Substances.

SUB-COMMITTEE ON NURSING (See Advisory Committee to Paramedical Groups)

COMMITTEE ON NUTRITION (Council on Scientific Advancement)

Paul A. Dailey, Chairman

620 N. Main St., Carrollton 62016

A. A. Filek

1806 Maple St., Box 870, Evanston 60204

Eugene Johnson

22 W. Main St., Casey 62420

Harvey D. Scott

800 W. State St., Jacksonville 62650

T. Bruce Vest

193 Voltaire, Godfrey 62035

CONSULTANT:

Paul R. Cannon

Rt. 2—Box 56, Yorkville 60560

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall serve as a source of information on nutrition matters for the ISMS and evaluate available information and make recommendations to the Board of Trustees for the position the ISMS should take on issues in this area. It shall cooperate with institutions and voluntary health agencies in disseminating information on nutrition subjects to the profession and to the public. It shall be on the alert for misleading or fallacious programs and information which need correction for the protection of the public.

COMMITTEE TO STUDY OSTEOPATHIC PROBLEMS (Board of Trustees)

William E. Adams, *Chairman* 55 E. Erie St., Chicago 60611

George E. Giffin

203 Park Ave., East, Princeton 61356

Frank J. Jirka

1507 Keystone Ave., River Forest 60305

W. C. Scrivner

4601 State St., East St. Louis 62205

CONSULTANTS:

W. C. Bornemeier

4665 Peterson Ave., Chicago 60646

Philip G. Thomsen

13826 Lincoln Ave., Dolton 60419

STAFF: George F. Lull

Responsibilities and Purposes

The responsibilities of this committee are to assist in developing rapport, cooperation with and an understanding of the osteopathic profession. Its findings in any specific instance shall be reported to either the Board of Trustees or the House of Delegates for consideration and action. The committee shall study and report on the present situation in Illinois in view of recent action by the AMA House, and keep the board informed of any changes in relationship between the two professions.

POLICY COMMITTEE (Board of Trustees)

William E. Adams, *Chairman* 55 E. Erie St., Chicago 60611 Frank J. Jirka, Jr.

1507 Keystone Ave., River Forest 60305

Paul P. Youngberg

1520 Seventh St., Moline 61265 STAFF: Frances C. Zimmer

Responsibilities and Purposes

The committee shall consist of three members of the Board of Trustees appointed by the chairman. It shall continually review past and current proceedings of the House of Delegates to determine the established policies of the Illinois State Medical Society.

ADVISORY COMMITTEE TO PARAMEDICAL GROUPS (Council on Public Relations)

W. I. Taylor, Chairman

28 N. Main St., Canton 61520

A. L. Burdick, Jr.

5906 W. North Ave., Chicago 60639

Thomas R. Harwood

4902 Tollview Dr., Rolling Meadows 60008

Edward J. Krol

4255 W. 63rd St., Chicago 60629

STAFF: James Slawny

Responsibilities and Purposes

The Advisory Committee to Paramedical Groups shall cooperate with the various sub committees already established, and with any other such organization developed in the future.

HEALTH CAREERS COUNCIL OF ILLINOIS MEDICAL ADV. COM.

Allison L. Burdick, Jr., Chairman

5906 W. North Ave., Chicago 60639

John B. Hall, Jr.

1425 S. Racine Ave., Chicago 60608

Samuel B. Nelson

3131 N. Lincoln Ave., Chicago 60657

J. E. Purdy

1499 Meyer, Elgin 60120

Joseph C. Sodaro

7318 Madison St., Forest Park 60130

CONSULTANTS:

James B. Hartney

410 Lake St., Oak Park 60301

Maynard I. Shapiro

7531 Stony Island Ave., Chicago 60649

STAFF: James Slawny

Responsibilities and Purposes

This sub-committee of the Advisory Committee to Paramedical Groups is responsible for advising the Health Careers Council of Illinois on all matters regarding careers in medicine. It shall also advise and assist the council in the development of new financial resources needed to maintain its operation. The chairman of this committee shall be the designated representative to HCCI and shall report to the Board of Trustees.

ILLINOIS MEDICAL ASSISTANTS ASSN., ADVISORY COMMITTEE

Thomas R. Harwood, Chairman

4902 Tollview Dr., Rolling Meadows 60008 Carl P. Birk

321 W. William St., Decatur 62522

Donald E. Dick

606 S. Riverside Dr., St. Charles 60174

George Dohrman

3000 W. Logan Blvd., Chicago 60647

Clarence G. Glenn

152 N. Edward St., Decatur 62522

H. H. Pillinger, Jr.

1100 Larkin Ave., Elgin 60120

Maynard I. Shapiro

7531 Stony Island Ave., Chicago 60649

Paul G. Theobald

1210 Towanda, Bloomington 61701

ADVISORY COMMITTEE TO PARAMEDICAL GROUPS (Continued)

CONSULTANTS:

Carl E. Clark

225 Edward St., Sycamore 60178

Caesar Portes

25 E. Washington St., Chicago 60602

Philip G. Thomsen

13826 Lincoln Ave., Dolton 60419

STAFF: Miss Gaylen Lair

Responsibilities and Purposes

The committee shall be responsible to the board for maintaining effective liaison between the society and the Illinois Medical Assistants Association; it shall cooperate with county medical societies in the establishment of medical assistants associations; and shall, upon request, advise the Medical Assistants Association with respect to programs. The committee shall counsel with the officers and committees of the Medical Assistants Association and serve to maintain channels of communication between the two organizations at all times. It shall function as a sub-committee of the Advisory Committee to Paramedical Groups.

SUB-COMMITTEE ON NURSING

Ted LeBoy, Chairman

330 Gale Ave., River Forest 60305

T. J. Conley

12 Berry Pkwy., Park Ridge 60068

Angelo P. Creticos

67 E. Madison St., Chicago 60603

Henrietta Herbolsheimer

950 E. 59th St., Chicago 60637

H. J. Kolb

St. Joseph 61873

Clarence Norberg

2155 N. Cleveland Ave., Chicago 60614

Nicholas P. Primiano

108 Scott St., Joliet 60431

CONSULTANTS:

Willard C. Scrivner

4601 State St., East St. Louis 62205

W. I. Taylor

28 N. Main St., Canton 61520

AUXILIARY REPRESENTATION:

Mrs. Mitchell A. Spellberg

7408 S. Clyde Ave., Chicago 60649

STAFF: James Slawny

Responsibilities and Purposes

The major objective of this committee is to establish a close professional relationship between the medical and nursing professions for the improvement of the health care of the patient. It should work with representatives of the nursing organizations to obtain sound educational programs for nurses, to improve the working relationships of the doctor and nurse in the hospital, and to help establish work patterns for nurses in the hospital which utilize the full skill of the nurse for the care of the patient. The committee should also assist in programs to recruit more graduate nurses, registered nurses, practical nurses, nurses aids and other ancillary nursing personnel. It shall function as a sub-committee of the Advisory Committee to Paramedical Groups.

ADVISORY COMMITTEE TO STUDENT A.M.A.

Edward J. Krol, Chairman

4255 W. 63rd St., Chicago 60629

Hilger P. Jenkins

950 E. 59th St., Chicago 60637

Max M. Montgomery

2052 Lincoln Park W., Chicago

Edward S. Petersen

303 E. Chicago Ave., Chicago 60611

David B. Radner

2939 Cottage Grove Ave., Chicago 60616

CONSULTANT:

William E. Adams

55 E. Erie St., Chicago 60611

AUXILIARY REPRESENTATION:

Mrs. Lewis A. Hare

10811 S. Fairfield Ave., Chicago 60643

STAFF: Marvin Schroder

Responsibilities and Purposes

The committee is charged with the responsibility of maintaining liaison with officers of Student AMA Chapters in Illinois; establishing programs to acquaint medical students with the principles of organized medicine; and developing programs designed to advance the purposes of both organizations. It shall function as a sub-committee of the Advisory Committee to Paramedical Groups.

COMMITTEE ON PREPAYMENT PLANS

(Council on Medical Service)

Philip C. Lynch, Chairman 1314 N. Main St., Decatur 62526

Preston S. Houk

207 Parkview Dr., Bloomington 61701

B. A. Kinsman

2071/2 E. Main St., DuQuoin 62832

Max S. Sadove

1021 Lathrop Ave., River Forest 60305

E. Lee Strohl

122 S. Michigan Ave., Chicago 60603

Theodore J. Wachowski

310 Ellis Ave., Wheaton 60187

STAFF: Marvin Schroder

Responsibilities and Purposes

The function of the committee is to provide a channel of communication between the health insurance industry, Blue Cross-Blue Shield Plans, and the Illinois State Medical Society on matters of mutual concern. Specific problems which may arise as a result of this liaison will be referred to appropriate committees for detailed study.

ADVISORY COMMITTEE TO OTHER PROFESSIONAL GROUPS (Council on Public Relations)

James D. Majarakis, Chairman

30 N. Michigan Ave., Chicago 60602

Lawrence J. Bowness

9135 S. Exchange Ave., Chicago 60617

Walter J. Reedy

814 Washington St., Waukegan 60085

Vincent C. Sarley

811 W. Wellington St., Chicago 60657

Raymond Schale

70 Meadowview Ct., Kankakee 60901

Eugene L. Vickery

202 S. Schuyler St., Lena 61048

David Whitsell

2441 W. 79th St., Chicago 60652

CONSULTANTS:

Andrew J. Brislen

6060 S. Drexel Ave., Chicago 60637

George Callahan

4 S. Genesee St., Waukegan 60085

E. A. Piszczek

6410 N. Leona St., Chicago 60646

STAFF: George F. Lull and Roger N. White

Responsibilities and Purposes

This committee shall maintain general liaison with the officers and members of other professions, conduct programs and activities which will en-

hance the relationship between the professions. A sub-committee shall serve to provide liaison with the Interprofessional Council.

Special attention shall be given to liaison with the Bar Association. The responsibilities formerly assigned to the Medical Legal Committee shall be provided by this committee as follows: (a) educate the members of the profession in medico legal affairs and cooperate with the AMA in its program.

The same shall pertain to the work of the former Committee on Medical Testimony, and this committee shall have the authority to examine any member of the ISMS who is either suspected of, or has been accused of giving improper testimony in any court proceedings. It shall (if deemed necessary) procure and examine transcripts of court testimony to determine whether or not fraudulent testimony has been given and report its findings to the Board of Trustees. When irregularities are found, the Board may submit the findings to the Ethical Relations Committee of the county medical society.

A sub-committee may be appointed to act with members of a similar committee of the Illinois Bar Association in matters involving both professions.

COMMITTEE ON PUBLIC AFFAIRS (Council on Legislation and Public Affairs)

Theodore Grevas, Chairman

1800 Third Ave., Rock Island 61201

William F. Ashley

6441 W. North Ave., Oak Park 60302

Francis E. Bihss

4601 State St., East St. Louis 62205

Carl P. Birk

321 W. William St., Decatur 62522

William W. Boswell

2500 N. Rockton Ave., Rockford 61103

Herschel Browns

4600 N. Ravenswood Ave., Chicago 60640

Donald E. Clark

Memorial Hospital, Springfield 62705

James H. Cravens

1101 Maine St., Quincy 62301

Edwin L. Falloon

9450 S. Francisco Ave., Evergreen Park 60642

Justin Fleischman

41 S. Brockway, Palatine 60067

Arthur W. Fleming

10400 S. Western Ave., Chicago 60643

George Gertz

2376 E. 71st St., Chicago 60649

Glen H. Harrison

1616 Grand Ave., Waukegan 60085

P. H. Heller

1173 Algonquin Rd., DesPlaines 60018

Joseph R. Mallory

Link Clinic, Mattoon 61938

W. Robert Malony

Carbondale Clinic, Carbondale 62901

L. F. Mammoser

6424 N. Northwest Hwy., Chicago 60631

John W. Ovitz, Jr.

204 W. Elm St., Sycamore 60178

James D. Rogers

1230 Scott St., Joliet 60435

Peter Rumore

401 N. Mulberry St., Effingham 62401

Stanley Ruzich

9944 S. Damen Ave., Chicago 60643

John L. Savage

723 Elm St., Winnetka 60093

Julius P. Schweitzer

120 Oak Brook Mall, Oak Brook 60521

Eugene H. Siegel

103 Haven Rd., Elmhurst 60126

Frederick Weiss

15318 Center Ave., Harvey 60426

Lorin D. Whittaker

331 Fulton St., Peoria 61602

CONSULTANTS:

J. Ernest Breed

55 E. Washington St., Chicago 60602

Frank J. Jirka, Jr.

1507 Keystone Ave., River Forest 60305

COMMITTEE ON PUBLIC AFFAIRS (Continued)

Philip G. Thomsen 13826 Lincoln Ave., Dolton 60419

AUXILIARY REPRESENTATION:

Mrs. David Kweder

1432 N. Sheridan Rd., Waukegan 60085

STAFF: James Brady Responsibilities and Purposes

The Public Affairs Committee is concerned with the political process as it pertains to medicine and public health. Within this broad context, appropriate education of the public is basic to continue health improvement in a free society. The electorate must make its wishes known to public officials.

The Public Affairs Committee shall strive to generate interest in the overall field of politics to enable the physician to participate effectively. Programs of public affairs orientation, political education, and campaign characteristics will be undertaken to increase the effectiveness of the physician in public affairs.

SUB-COMMITTEE ON PUBLIC SAFETY (See Committee on Disaster Medical Care)

MEDICAL ADVISORY COMMITTEE TO THE ILLINOIS DEPARTMENT OF PUBLIC AID

(Council on Medical Service)

Fred A. Tworoger, Chairman

4753 Broadway, Chicago 60640

Rex O. McMorris, Vice Chairman

619 N. East Glen Oak Ave., Peoria 61603

Charles E. Baldree, Jr.

26 E. Washington St., Belleville 62220

Robert F. Bettasso

313 W. Madison, Ottawa 61350

James R. Cooper

1416 Maine St., Quincy 62301

Heinz Otto E. Hoffmann

1314 N. Main St., Decatur 62526

Chauncey C. Maher, Jr.

709 Myers Bldg., Springfield 62701

George T. Mitchell

116 S. 5th St., Marshall 62441

Robert C. Muehrcke

518 N. Austin Blvd., Oak Park 60302

Frank B. Norbury

1515 W. Walnut St., Jacksonville 62650

Alphonse L. Robinson

104a N. Front, Mounds 62964

William Scanlon

654 - 1st St., LaSalle 61301

Frank P. Skaggs

11 E. Poplar St., Harrisburg 62946

John H. Steinkamp

824 Van Buren St., Belvidere 61008

R. Kent Swedlund

112 N. Fourth St., Watseka 60970

STAFF: Marvin Schroder

Responsibilities and Purposes

The Medical Advisory Committee meets at regular intervals with the staff of the Illinois Department of Public Aid to perform functions necessary to the operation of the medical program under public aid. The committee renders advisory decisions on matters of medical policy in the administration of the quality, quantity, and cost standards of the various public aid programs. The committee

operates in conjunction with an established system of county medical advisory committees and serves as a final reviewing body. It provides a channel of communication between physicians and the Department of Public Aid and strives to foster mutual understanding and good relationships.

The committee's functions also include a continuing program of education of physicians to familiarize them with the administrative details of public aid programs.

SUB-COMMITTEE ON DRUGS & THERAPEUTICS

Robert C. Muehrcke, Chairman

518 N. Austin Blvd., Oak Park 60302

Joseph Cece

120 Oakbrook Center, Oak Brook 60521

Charles R. Frazer, Jr.

1401 Gaty Ave., East St. Louis 62201

Edsel K. Hudson

5054 S. Woodlawn Ave., Chicago 60615

Gordon Lucas

6670 E. State St., Rockford 61108

CONSULTANTS:

Theodore R. Sherrod, Ph.D., M.D.

901 S. Wolcott Ave., Chicago 60612

Louis Gdalman, R.Ph.

1753 W. Congress St., Chicago 60612

STAFF: Miss Gaylen Lair

Responsibilities and Purposes

The committee will operate as a sub-committee of the Advisory Committee to the Illinois Department of Public Aid and will continue to work with the department in an effort to keep the Drug Manual current and effective. When suggestions and comments from the members are submitted to the committee, it will review them and present them to the Department of Public Aid when necessary. The committee will also consider other drug matters affecting the policy of the medical society.

COMMITEE ON PUBLIC HEALTH (Council on Scientific Advancement)

Thomas P. deGraffenried, *Chairman* 1208 Sunnymeade, DeKalb 60115

Edward C. Holmblad

1350 Lake Shore Dr., Chicago 60610

Fred Long

2116 N. Sheridan, Peoria

Clarke W. Mangun, Jr.

733 S. Greenwood Ave., Park Ridge 60068

Charles K. Petter

2400 Belvidere St., Waukegan 60085

Grover L. Seitzinger

812 N. Logan, Danville 61832

STAFF: Perry Smithers

Responsibilities and Purposes

The Committee on Public Health shall cooperate with the Illinois Department of Public Health in certain specific areas. Its responsibilities shall include the maintenance, protection and improvement of the health of the people of Illinois through organized community efforts. The committee shall encourage community projects which provide medical services in the fields of contagious diseases, environmental and occupational health, and in providing hospitalization for those whose illness might affect the health of the community.

The committee should encourage the establishment of county or multi-county health units, work with the state department in immunization programs or specific programs designed to diagnose and refer certain communicable diseases.

The following sub-committees are assigned to the Committee on Public Health, with their respective duties outlined under each: Environmental Health, Laboratory Evaluation, Occupational Health, and Tuberculosis.

SUB-COMMITTEE ON ENVIRONMENTAL HEALTH

Clarke W. Mangun, Jr., Chairman

733 South Greenwood Ave., Park Ridge 60068

Howard C. Burkhead

Evanston Hospital, Evanston 60201

Edward C. Holmblad

1350 Lake Shore Dr., Chicago 60610

John S. Hyde

715 Lake St., Oak Park 60301

Ralph H. Kunstadter

664 N. Michigan Ave., Chicago 60611

Robert J. Maganini

727 W. Hickory St., Hinsdale 60521

Grover Seitzinger

812 N. Logan, Danville 61832

Joseph S. Skom

707 N. Fairbanks Ct., Chicago 60611

Franklin D. Yoder

503 State Office Bldg., Springfield 62706

STAFF: Perry Smithers

Responsibilities and Purposes

The committee is responsible for medicine's

interest in the relationship of man to his surroundings, particularly those areas which pertain to the control of transmissible disease; air, water and soil pollution; health problems related to population growth; urbanization and technicological developments bearing on the ecology of man.

SUB-COMMITTEE ON OCCUPATIONAL HEALTH

Edward C. Holmblad, Chairman

1350 Lake Shore Dr., Chicago 60610

Charles Asbury

100 N. E. Adams, East Peoria 61602

George H. Irwin

1791 Howard St., Chicago 60626

Arthur E. Sulek

Health Department, City Hall, Rockford 61104

Chester R. Zeiss

9944 S. Oakley, Chicago 60643

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall be concerned with diseases and problems associated with occupational and industrial health; co-operate with the Council on Occupational Health of the American Medical Association, Industrial Medical Association and similar state agencies and recommend to the State of Illinois Workman's Compensation Board medical procedures designed to assist the Board in the evaluation of claims. It shall function as a subcommittee of the Committee on Public Health.

SUB-COMMITTEE ON TUBERCULOSIS

Charles K. Petter, Chairman

2400 Belvidere St., Waukegan 60085

Otto Bettag

526 Crescent Blvd., Glen Ellyn 60137

Kenneth G. Bulley

1329 N. Lake St., Aurora 60506

Charles W. Gray

2500 N. Rockton Ave., Rockford 61103

Clifton Hall

400 Spring St., Springfield 62706

Hiram T. Langston

1919 W. Taylor St., Chicago 60612

David F. Loewen

Macon County TB Sanatorium,

400 W. Hay St., Decatur 62526

Karl H. Pfuetze

Sub. Cook County TB Sanatorium

District, Hinsdale 60521

William P. Standard

301 E. Jefferson St., Macomb 61455

George C. Turner

6627 Ponchartrain Blvd., Chicago 60646

Consultants:

William E. Adams

55 E. Erie St., Chicago 60611

Edward A. Piszczek

6410 Leona Ave., Chicago 60646

COMMITTEE ON PUBLIC HEALTH (Continued)

Darrell H. Trumpe

St. John's Sanatorium, Springfield 62707

STAFF: Perry Smithers

Responsibilities and Purposes

This committee shall serve as a source of information on tuberculosis matters for the ISMS, and evaluate available information and make recommendations to the Board for the position the ISMS should take on issues in this area. It shall cooperate with institutions and voluntary health agencies in disseminating information on tuberculosis subjects to the profession and to the public. It shall be on the alert for misleading or fallacious programs and information which need correction for the protection of the public. It shall function as a sub-committee of the Committee on Public Health.

SUB-COMMITTEE ON LABORATORY EVALUATION

Grover L. Seitzinger, Chairman 812 N. Logan Ave., Danville 61832 Ronald C. Jessen

5145 N. California Ave., Chicago 60625

Jack Williams

130 E. Randolph St., Chicago 60601

Hans Willuhn

1335 Charles St., Rockford 61108

CONSULTANTS:

Gerald Dean

2371 St. Johns Ave., Highland Park 60035

James B. Hartney

410 Lake St., Oak Park 60302

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall effect methods of elevating and maintaining the standards of medical laboratories in Illinois; encourage the use of medical diagnostic laboratories supervised by duly qualified physicians, and encourage each county and district to establish evaluation committees. It shall function as a sub-committee of the Committee on Public Health.

COMMITTEE ON PUBLIC RELATIONS (Council on Public Relations)

Matthew B. Eisele, Chairman

4601 State St., East St. Louis 62205

Peter C. Rumore

401 N. Mulberry St., Effingham 62401

Charles S. Vil

9450 S. Francisco St., Evergreen Park 60642

Charles J. Weigel

7579 Lake St., River Forest 60305

Lee F. Winkler

850 S. Fourth St., Springfield 62703

CONSULTANTS:

Jacob E. Reisch

1129 S. Second St., Springfield 62704

Leo P. A. Sweeney 2658 W. 95th St., Evergreen Park 60642 STAFF: James Slawny

Responsibilities and Purposes

The Committee on Public Relations shall consist of five members appointed by the Board of Trustees.

It shall plan and execute programs designed to enhance the relationship between the public and the medical profession. It shall request the Board of Trustees to appoint sub-committees to accomplish specific purposes.

COMMITTEE ON QUACKERY (Judicial Council)

Edward A. Piszczek, Chairman

6410 N. Leona Ave., Chicago 60646

Robert F. Bates

250 N. Ottawa St., Joliet 60431

John S. Kapernick

142 E. Prairie Ave., Decatur 62523

Mladen Mijanovich

556 W. Grant St., Marengo 60152

Raymond B. Murphy

RFD 3, Robinson 62454

Elliott Parker

1630 - 5th Ave., Moline 61265

William B. Rich

706 S. Wolcott Ave., Chicago 60612

Simon Y. Saltman

7531 Stony Island Ave., Chicago 60649

T. R. Van Dellen

468

435 N. Michigan Ave., Chicago 60611

Wilson H. West

7300 State St., East St. Louis 62201

CONSULTANT:

Jacob E. Reisch

1129 S. 2nd St., Springfield 62704

STAFF: Mel Sloan

Responsibilities and Purposes

The committee shall concern itself with the illegal practice of medicine and other healing arts groups associated with unfounded claims for cure of disease. It shall cooperate with the legal authorities of the state, (such as the office of the Attorney General) in providing information and witnesses for the prosecution of violators of the law. It shall cooperate with the AMA's Department of Investigation and other agencies interested in this field.

COMMITTEE ON RADIATION (Council on Scientific Advancement)

Howard C. Burkhead, Chairman 2650 Ridge Ave., Evanston 60201 Abram H. Cannon 194 Michael John Dr., Park Ridge 60068 Stephen L. Casper 1101 Maine St., Quincy 62301

Robert W. Donnelly

812 N. Logan Ave., Danville 61833

J. Homer Goodlad

221 N. E. Glen Oak Ave., Peoria 61603

Stuart P. Lippert

7 Pitner Pl., Jacksonville 62650

James J. Nickson

2929 S. Ellis Ave., Chicago 60616

Hyman R. Osheroff

1309 S. Walnut St., Freeport 61032

Norman R. Shippey

4601 State St., East St. Louis 62205

Raymond B. White

9333 S. Damen Ave., Chicago 60620

CONSULTANTS:

J. Ernest Breed 55 E. Washington St., Chicago 60602

Carl E. Clark

225 Edward St., Sycamore 60178

STAFF: Perry Smithers

Responsibilities and Purposes

The committee shall serve as a source of information on radiation matters for ISMS and evaluate available information and make recommendations to the Board for the position ISMS should take on issues in this area. It shall cooperate with institutions and voluntary health agencies in disseminating information on radiation subjects to the profession and to the public. It shall be on the alert for misleading or fallacious programs and information which need correcting for the protection of the public.

COMMITTEE ON REHABILITATION SERVICES (Council on Scientific Advancement)

Henry B. Betts, Chairman

401 E. Ohio St., Chicago 60611

Brian Huncke

454 Pennsylvania, Glen Ellyn 60137

Joseph L. Koczur

9145 S. Ashland Ave., Chicago 60620

Joseph A. Petrazio

18 N. 11th St., Murphysboro 62966

Arthur Rodriquez

9145 S. Ashland Ave., Chicago 60620

Howard W. Schneider

238 W. 154th St., Harvey 60426

CONSULTANTS:

Frank J. Jirka, Jr.

1507 Keystone Ave., River Forest 60305

W. T. Liberson

P. O. Box 28, Hines 60141

Reuben R. Wasserman

820 S. Damen Ave., Chicago 60612

STAFF: Perry Smithers

Responsibilities and Purposes

The purposes of the committee are to provide liaison between the Illinois State Medical Society and the Division of Vocational Rehabilitation, the Department of Public Aid, and other official or non-official agencies which purchase rehabilitation care for patients. The committee also works closely with the Governor's Committee on Employment of the Handicapped when called upon for its advice and counsel.

The committee shall render assistance to public and private agencies in the establishment of policies regarding rehabilitation facilities to be used and selection of patients for these services; encourage the training of rehabilitation personnel, thereby promulgating high quality care; and assist when possible to see that adequate medically supervised rehabilitation services be made available in all hospitals, according to the need of the hospital.

SUB-COMMITTEE ON RELATIVE VALUE (See Committee on Medical **Economics & Insurance)**

469 for October, 1967

COMMITTEE ON RELIGION & MEDICINE

(Council on Public Relations)

Robert S. Mendelsohn, Chairman

411 Briar Pl., Chicago 60614

Lars Arden Almquist

5101 N. Francisco Ave., Chicago 60625

Eli L. Borkon

Carbondale Clinic, Carbondale 62901

Anna A. Marcus

5852 W. North Ave., Chicago 60639

Charles W. Pfister

5511 N. Harlem Ave., Chicago 60656

Paul S. Rhoads

814 Roslyn Terrace, Evanston 60621

The Very Rev. Msgr. Armand J. Rotondi (M.D.)

504 Lockport, Plainfield

Ernest Teagle

10 W. Harrison St., Belleville 62221

E. T. Sorenson

2300 N. Rockton Ave., Rockford 61101

William H. Whiting

Box 410, 525 N. Main St., Anna 62906

CONSULTANTS:

J. Ernest Breed

55 E. Washington St., Chicago 60602

Caesar Portes

25 E. Washington St., Chicago 60602

AUXILIARY REPRESENTATION:

Mrs. Sherman C. Arnold

2416 Bookwood Dr., Flossmoor 60422

STAFF: Marvin Schroder

Responsibilities and Purposes

The committee is responsible for the development of effective lines of communication between the physicians and the clergymen leading to the most effective care and treatment of the patient and his family.

COMMITTEE ON RURAL HEALTH & STUDENT LOAN (Council on Medical Education)

Jack L. Gibbs, Chairman

24 Main St., Canton 61520

Charles N. Salesman

1201 N. Allen St., Robinson 62454

Donald L. Stehr

527 Broadway, Havana 62644

CONSULTANT:

Jacob E. Reisch

1129 South Second St., Springfield 62704

STAFF: Roland I. King Responsibilities and Purposes

The committee shall be responsible to the Board

of Trustees in matters related to improving the standards of health in rural areas and with administration of the Student Loan Program operated jointly with the Illinois Agricultural Association. Members of the committee shall be appointed by the Board for terms of one year. The committee shall work closely with the Illinois Agricultural Association in efforts to improve the standard of health in farm areas. Also among these responsibilities is to induce physicians to practice in rural areas through the joint program with the Illinois Agricultural Association.

COMMITTEE ON SCIENTIFIC ASSEMBLY (Council on Medical Education)

Robert T. Fox, Chairman

2136 Robin Crest Lane, Glenview 60025

Coye C. Mason, Director of Exhibits

2052 N. Orleans St., Chicago 60614

John J. Brosnan

9156 S. Francisco St., Evergreen Park 60642

Robert R. Fahringer

1230 S. 6th St., Springfield 62706

Charles P. McCartney

5841 S. Maryland Ave., Chicago 60637

Harold P. McGinnes

2304 S. Oakland Ave., Bloomington 61701

Robert G. Page

950 E. 59th St., Chicago 60637

J. Robert Thompson

1129 N. Elmwood Ave., Oak Park 60302

Donald L. Unger

185 N. Wabash Ave., Chicago 60601

AUXILIARY REPRESENTATIVES:

Mrs. H. C. Schorr

1317 E. 50th St., Chicago 60615

Mrs. Richard Westland

5114 Farwell Ave., Chicago 60676

CONSULTANT:

William M. Lees

7000 N. Kenton Ave., Lincolnwood 60646

Responsibilities and Purposes

The Committee on Scientific Assembly shall consist of nine members appointed by the Board of Trustees. It shall coordinate the programs for the general assemblies; the section meetings and the scientific exhibits at the annual convention; shall appoint, with the approval of the board, a secret committee to make awards to the scientific exhibitors; may incorporate in the annual scientific meeting those meetings of medical speciality groups which wish to affiliate with the Illinois State Medical Society annual convention, and shall arrange for the annual banquet and other social functions held during the annual convention.

SCIENTIFIC SECTION CHAIRMEN

ALERGY

Arnold A. Gutman

111 N. Wabash Ave., Chicago 60602

DERMATOLOGY

Marshall L. Blankenship

9504 S. Hamilton, Chicago 60643

E. E. N. T.

Roland I. Pritikin

1211 Talcott Bldg., Rockford 61101

INTERNAL MEDICINE

Angelo P. Creticos

67 E. Madison St., Chicago

NEUROLOGY &

PSYCHIATRY

Harold E. Himwich State Research Hospital

Galesburg 61401

OBSTETRICS & GYNECOLOGY

Thomas R. Wilson

602 West University, Urbana 61801

PATHOLOGY

Gerald Dean

2371 St. John Ave., Highland Park 60035

PEDIATRICS

Ira M. Rosenthal

P.O. Box 6998, Chicago 60680

PHYSICAL MEDICINE

W. T. Liberson

V.A. Hospital, Hines 60141

PREVENTIVE MEDICINE &

PUBLIC HEALTH

Fred Long

2116 N. Sheridan, Peoria 61604

RADIOLOGY

J. Homer Goodlad

Methodist Hospital, Peoria 61604

SURGERY

Burton C. Kilbourne

401 S. Michigan Ave., Chicago 60601

SUB-COMMITTEE, ADVISORY TO STUDENT AMERICAN MEDICAL ASSOCIATION

(See Advisory Committee to Paramedical Groups)

SUB-COMMITTEE ON TUBERCULOSIS (See Committee on Public Health)

COMMITTEE ON USUAL AND CUSTOMARY FEES

(Board of Trustees)

Philip G. Thomsen, *Chairman* 13826 Lincoln Ave., Dolton 60419

Carl E. Clark

225 Edward St., Sycamore 60178

Frank J. Jirka, Jr.

1507 Keystone Ave., River Forest 60305

Mather Pfeiffenberger

State & Wall Sts., Alton 62002

Warren W. Young

10816 Parnell Ave., Chicago 60628

STAFF: James Slawny

Responsibilities and Purposes

The Committee on Usual & Customary Fees was

appointed by the Board of Trustees to define the concepts of usual, customary, and reasonable fees, and to develop guidelines for the implementation of these concepts at the county, district, and state society level. In carrying out the directive that physicians be reimbursed on the basis of their usual and customary fees without reference to existing fee schedules, the committee meets with representatives of health insurance carriers, government intermediaries, and government agencies who pay for medical services, and reviews the adequacy and appropriateness of physician reimbursement in accordance with the position of the Board of Trustees and the House of Delegates.

ADVISORY COMMITTEE TO THE WOMAN'S AUXILIARY

(Board of Trustees)

Philip G. Thomsen, *Chairman* 13826 Lincoln Ave., Dolton 60419

Newton DuPuy

1101 Maine St., Quincy 62301

Arthur F. Goodvear

142 E. Prairie Ave., Decatur 62523

STAFF: George F. Lull

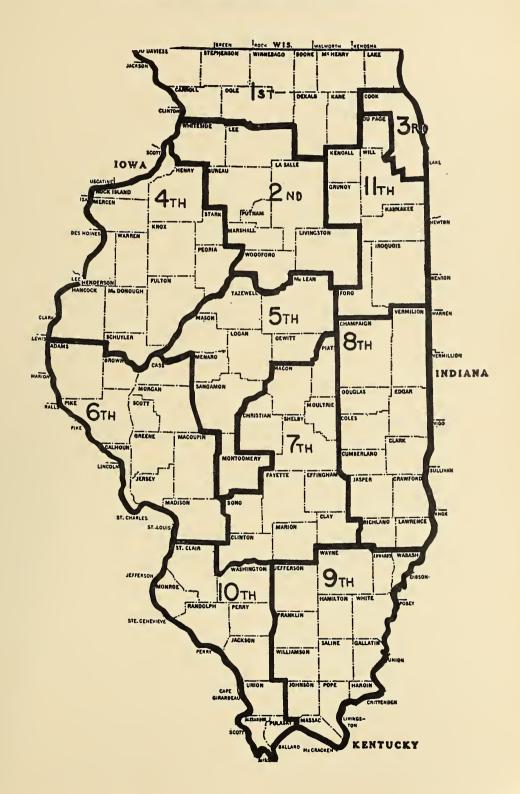
Responsibilities and Purposes

The committee shall consist of the presidentelect as chairman, the president, the chairman of the board. The committee shall provide advice and assistance to the president of the Woman's Auxiliary in her program for the year, and shall assist her in interpreting the activities of the state medical society to the auxiliary members.

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Illinois Medical Political Action Committee (IMPAC)

The Illinois Medical Political Action Committee (IMPAC) is a voluntary, non-profit, unincorporated, permanent membership organization founded in 1960. IMPAC serves as the unified political action arm of Illinois physicians and their wives. It cooperates with others in the healing arts professions. Funds collected through IMPAC memberships, used in support of candidates, are administered independently of other professional groups. However, the program is operated in harmony with the legislative objectives of the Illinois State Medical Society. Individual participation in IMPAC is one means by which the individual physician and his wife can effectively participate in public affairs.

IMPAC participates primarily in election contests for legislative offices—both those in the Illinois General Assembly and in the U. S. Congress. It cooperates, both in election efforts and in membership solicitation activities, with the American Medical Political Action Committee (AMPAC), its counterpart on the national level. IMPAC's organization consists of a chairman, an executive committee, and a council. Political action activities are implemented by local physician support committees formed on behalf of candidates in U. S. Congressional or other legislative districts. Candidate selection and support are determined on the basis of evaluations and recommendations submitted to the council and executive committee by the local committees, thus assuring members of a "grass roots" voice in IMPAC activities.

Additional information about IMPAC may be obtained by writing: IMPAC, 360 N. Michigan Ave., Chicago 60601.

Illinois Medical Assistants Association

The Illinois Medical Assistants Association is just what the name implies-an Association of Medical Assistants throughout the State of Illinois who have become an educational organization with objectives as follows: (a) To bring into one association all medical assistant organizations of the State of Illinois; (b) to provide an organization for those residing in Illinois counties where no medical assistants societies are organized; (c) to assist the physicians in improving medical public relations; (d) to maintain and advance the standards of professional employment and to give honest, loyal and efficient service to the medical profession and the public; (e) to meet from time to time to secure interchange of ideas.

The medical assistant associations are educational groups—not social. We are not a union and any attempt to promote the unionization of this society or its members automatically forfeits the membership of the person or persons making such an attempt.

Now the qualified medical assistant has the opportunity to pass a special board examination

and thus become a "Certified Medical Assistant." This will affect directly or indirectly every physician's office. Of note is the fact that you do not have to belong to the Association to take this examination. For further information as to qualifications necessary to take the examination write to American Association of Medical Assistants, 510 N. Dearborn St., Chicago 60610.

Local programs in the component societies of IMAA are geared to the needs of that particular area. Obviously the strictly specialist areas would have entirely different problems and educational needs than the area of the general practitioner where the office is staffed by one or two medical assistants. Hence the educational programs in your area would be decided by your own Medical Assistants and supervised by the doctors in your own county society.

We need you, Doctor, to encourage your medical assistants to join our association. But also you could help us by assisting us in selecting the proper educational programs which in the long run would be of most benefit to you. That is our whole purpose, to become better medical assistants so we can help you to help your patients.

ISMS SERVICES

Pursuit of Obligations

Purposes of the Illinois State Medical Society are:

- · to promote the science and art of medicine
- · to protect the public health
- · to evaluate the standards of medical education
- to unite the medical profession behind these purposes, and
- to unite with similar organizations in other states and territories of the United States to form the American Medical Association

The Society shall inform the public and the profession concerning the advancements in medical science and the advantages of proper medical care.

To fulfill these purposes, the Society maintains a headquarters office at 360 N. Michigan Ave., Chicago, and an office in Springfield at 520 S. Sixth St. Services of the Society, under the gen-

eral supervision of George F. Lull, M.D., Executive Administrator, are conducted by the following divisions:

Administration; Business Services; Public Relations and Economics; Legislation and Public Affairs, and Publications and Scientific Services.

Many and varied are the activities of the Society in pursuit of its obligations. Some of these activities are major programs of statewide (and sometimes national) interest for all citizens; others are of special interest to doctors, and still others are sponsored for specific groups or individuals.

Following are descriptions of the Society's divisions and the programs, services and publications available directly to Society members or sponsored for their benefit.

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DIVISION OF ADMINISTRATION

The Executive Administrator has the responsibility and the authority to provide for the smooth and efficient functioning of the Illinois State Medical Society.

The implementation of established policy, fiscal and budgetary matters; the employment of qualified personnel and the development and maintenance of personnel policies are all part of the Administrator's activities.

In order to provide the membership of the Society with the best professional staff services available, headquarters has been set up by divisions. The Division of Administration (which the Administrator directs personally) provides many important functions.

This Division develops liaison with the Board of Trustees and serves the chairman in carrying out his duties. It works closely with the speaker of

the House of Delegates and the officers of the Society to provide a smooth and efficient atmosphere in which the House may function.

The controlling factor in all these areas is the Constitution and Bylaws. Cooperation is maintained with the Committee on Constitution and Bylaws to present to the House all suggested changes for official action.

The Division, through the Administrator, channels all legal inquiries and works with the General Legal Counsel and the Special Legal Counsel to provide guidance to the officers, trustees, committee chairmen and county medical society officers.

The duties and powers of the Executive Administrator are of utmost importance, and are outlined in the Bylaws of the Society.

DIVISION OF BUSINESS SERVICES

Just as the entire staff of the Illinois State Medical Society exists to serve the needs of more than 10,000 members, the Division of Business Services exists to serve the needs of the other staff divisions. Specifically, all mail room, printing, duplicating, and central-supply services are provided by the division.

Membership records are maintained so that quick access may be had to correct information concerning the basic membership history of each of our members. In addition, forms to obtain dues, address changes and other necessary information are designed and supplied to each county society secretary for his use.

Electronic Data Processing

The Business Services Division has primary responsibility for development of computer processing service for ISMS administrative requirements. Membership dues billing, collection and reporting service is already available to county societies that desire the service, and mailing of the Society's membership publications will be handled by computer in the near future. The 1967 Reference Committee on the Opinion Research Survey recommended incorporation of modern data processing in support of administrative and membership programs. Special and study is being devoted by the Business Services Division to provide the information and data resources necessary to retain Illinois leadership in the world of organizational medicine.

Committees

The Committees on the Annual Leadership Conference and Rural Health and Medical Student Loan Fund are assigned to this division for the staff services which might be required. The Advisory Committee to the Annual Leadership Conference has responsibility for developing an

enlightening program which will help county society leaders find better ways to serve both the public and their county society membership more effectively. The Rural Health and Medical Student Loan Fund Committee co-administers the joint Illinois State Medical Society/Illinois Agricultural Association Medical Student Loan Fund Program. Since its inception in 1948 the program has helped over 125 qualified applicants to hurdle financial or borderline academic barriers to a medical education. The objective of the program is to provide an incentive to the prospective medical students to enter family practice in the areas in Illinois that are in need of new physicians to serve their rural communities.

Accounting and Budget

Responsibility for providing safekeeping and proper accounting for all money and securities of the Society rests with this division, upon the direction and guidance of the Board of Trustees Finance Committee, the Secretary-Treasurer, and the Executive Administrator. Assistance is offered to all interested staff and officers in the interpretation of the division's regular and special accounting and budgetary reports.

Liaison with outside agencies in regard to matters affecting the finances of the Society is a prime responsibility of this division; the Internal Revenue Service, the Society's banking and investment agencies, office building rental agent, and the American Medical Association are major examples.

Insurance Coverage

Provision for and maintenance of the Society's property, liability, and employee insurance coverages are handled within this division, so that legal and financial requirements are satisfied at the most economical premium cost. In this area of

responsibility, the assistance and cooperation of the Division of Economics and Insurance are utilized in order that best results for the Society may be obtained.

Standardization of office procedures and systems in order to reduce the cost and raise the efficiency of the office operation is a continuing assignment for the division. Assistance in personnel recruitment, job analysis, and salary range administration is provided to the Executive Administrator and other division directors.

DIVISION OF LEGISLATION AND PUBLIC AFFAIRS

As professional medicine strives to maintain the vigorous condition of the public health, the profession is vitally and intimately concerned with legislative actions of the Illinois General Assembly and the U. S. Congress which affect physicians, other members of the healing arts, and the lay public. To insure that the best health interests of the public and professional interests of the physician are served, the Division monitors all state and national legislation which affect the health of the individual and his community.

The monitoring process is designed to present the thoughtful views of professional medicine in Illinois on specific medically related pieces of legislation.

The ISMS Council on Legislation acts as the clearing house for legislative proposals recommended by specialized ISMS committees; generated by allied groups; produced by special interests and introduced by representatives and senators. Such legislation is thoroughly analyzed by physician-members of the specialized ISMS committee covering the subject matter of the introduced legislation.

Support or Oppose Legislation

Upon appropriate consideration and recommendation, legislation of medical significance in the Illinois Legislature is either supported or opposed to protect and promote the interests of the public and the profession. Pertinent subject matter testimony is presented before the House and Senate committees as the bill proceeds through the legislative process.

On-the-scene surveillance of monitored legis-

lation is maintained by ISMS legislative representatives.

Through these essential actions, ISMS plays a meaningful role in shaping legislation for the betterment of the people of Illinois.

Action similar to the above is taken with respect to bills in Congress when they have special significance to Illinois physicians. This activity is conducted in concert with the American Medical Association.

Integrated with and designed to augment the legislative activity is the Public Affairs Program. This program, executed by the Division of Legislation and Public Affairs, as directed by the ISMS Public Affairs Committee, strives to alert the physician to his role in public affairs and to involve him in effective participation in public affairs in his community, state, and nation.

Other Activities

Divisional activities also includes other services. One of these, involving medicine, law, and the judiciary, is the administration of the Impartial Medical Testimony program. Operating in conjunction with the Supreme Court of Illinois and the Federal District Court, the services of impartial medical examiners are provided in personal injury cases.

Other facets of medical-legal interaction are explored and problems resolved through liaison with like committees of the judiciary and the bar associations.

In addition to the foregoing, the division staffs the Committee on Narcotics and Hazardous Substances and the Committee on Quackery.

DIVISION OF PUBLICATIONS AND SCIENTIFIC SERVICES

All publications of the Society, including the *Illinois Medical Journal*, are produced through this division. The Journal, the official publication of the Society, is mailed monthly to all members, who are urged to read it to keep abreast of the scientific, economic, political, legal and social developments within the state. The editor welcomes suggestions for articles which may be of special interest to members.

Other publications are *Pulse*, a monthly newsletter, and *What Goes On In Illinois*, a calendar of events of medical interest.

Committee Responsibilities

The division also provides staff services for the Council on Scientific Advancement, the Council on Medical Education and 17 of the committees assigned to these councils.

Annual Convention

Similarly, the staff serves as an arm of the Committee on Scientific Assembly to arrange and produce the annual convention of ISMS. Held in May in Chicago each year, the convention offers scientific meetings and exhibits as well as sessions of the House of Delegates.

A new function of the division is to administer the affairs of the Educational and Scientific Foundation, a non-profit organization established to conduct educational and scientific projects related to medicine. Physicians are invited to become Fellows of the Foundation for a charter membership of \$100.

DIVISION OF PUBLIC RELATIONS AND ECONOMICS

The Public Relations and Economics Division serves both as a news outlet to the lay press, and as a source of supply for information on socio-economic and insurance matters to the membership.

With increasing frequency, the division is contacted by news writers seeking information on socio-economic, as well as scientific subjects. Its counseling services on public relations and publicity are available to any county medical society.

The division is also frequently called upon to prepare speeches, write and publish pamphlets and other materials and make them available for distribution on such subjects as public aid in Illinois, medical care financing through Social Security, and physician retirement programs.

So far as it is possible to do so, the division designs and directs research in the area of economics. Such projects have included the Relative Value and the Membership Fee Surveys.

Reference Library

A library providing a reference source for membership and staff use is maintained. Information is available on the cost of medical care; foreign medical care systems; needs and wants of the aged; their medical care, housing, health, finances and employment; and the Social Security system, its benefits, costs, financing, and coverage.

The division also provides information on matters pertaining to group insurance and retirement plans for the members of the state medical society and administrative staff.

News Releases

A mailing list of all Illinois newspapers, radio and television stations is maintained by the division. The list is so arranged that news releases may be addressed to individual counties, and county society secretaries may avail themselves of this service.

News releases for county societies are automatically prepared by the division staff and distributed to all news outlets in the particular county whenever a county society makes use of the ISMS post-graduate education program. Other

than this, the state society's staff does not prepare news releases of county society activities unless this service is specifically requested.

Health Columns for Newspapers

Currently, ISMS presents a weekly public service health column entitled "Dr. SIMS Says: Safeguard Your Health." This column, offered to the 700 newspapers in Illinois, carries a new logotype of Dr. "SIMS" which readily identifies the column with the Illinois State Medical Society. The division would appreciate hearing from members in areas where the column is not appearing.

Another public service column, being carried by some 300 high school newspapers throughout Illinois, is entitled "Dr. SIMS Talks to Teens." It is distributed on a monthly basis.

Public Aid Liaison

Familiarity with the medical care programs of the Illinois Department of Public Aid and liaison with the staff of the department are other responsibilities of the Division of Public Relations and Economics. Liaison is also maintained with public and private agencies interested in the fields of aging, insurance, hospitals, and rehabilitation.

Periodically, information is prepared for physicians and the public pertaining to such medical care programs as Old Age Assistance, Aid of the Medically Indigent, and the Military Dependents' Medical Care.

The division provides staff services to the Councils on Medical Services and Public Relations, as well as the committees on: Religion and Medicine, Membership, Disaster Medical Care, Public Safety, Ethical Relations, Hospital Relations, Prepayment Plans, Medical Economics and Insurance, Relative Value, Drugs and Therapeutics, Aging, and Public Relations.

Also provided with staff services are advisory committees to: Paramedical Groups, the Medical Assistants Association, the Student AMA, the Health Careers Council of Illinois, Other Professional Groups, and the Illinois Department of Public Aid.

THE EDUCATIONAL & SCIENTIFIC FOUNDATION

The Educational & Scientific Foundation was founded to provide an administrative agency to foster the advancement of clinical science through:

- 1) The initiation of scientific and medical research activities.
- 2) The collection, evaluation and dissemination of the results of research activities to the public.
- 3) The implementation and management of projects related to medicine for individuals or organizations seeking to inform or educate others, or to improve their own knowledge.

FILMS

Stroke—Early Restorative Measures in Your Hospital

A film entitled "Stroke—Early Restorative Measures in Your Hospital," produced by the ISMS Committee on Aging, is available from the Society.

Directed toward physicians in all general hospitals, regardless of size, the film illustrates simple and effective methods and devices used in the rehabilitation of stroke patients. It emphasizes the procedures to be instituted immediately upon the patient's admission to the hospital.

Primary purpose of the film is to inform physicians and nurses of the need for immediate action in stroke cases and to interest them in acquiring additional details for treatment through available publications or study courses.

The 20-minute sound, color film illustrates a program of constructive rehabilitation which progresses through three stages: (1) proper positioning, (2) transfer activities and early ambulation, and (3) training for self-care. It indicates how these major steps can be conducted in any hospital, however small, by an interested nurse using a minimum of equipment.

The film may be obtained from the Society on a loan basis for viewing without charge or may be purchased for \$125.

Modern Management of Multiple Births

"Modern Management of Multiple Births" is a 16 mm. sound-color motion picture produced by the Educational and Scientific Foundation of the Illinois State Medical Society in cooperation with Lederle Laboratories Division of American Cyanamid Co.

Teaching "heart" of the film is step-by-step reconstruction of an elaborate protocol which serves as a standard of prenatal planning for any physician faced with the management of multiple pregnancy.

Included are techniques of using a placentogram and the obstetrical procedures employed in breach and transverse lie presentations.

For added teaching interest, the film reviews birth of identical quadruplets, showing how identicality was established with major and minor blood typings, examination of placenta and fetal membranes and other procedures. There are also scenes of actual delivery of quadruplets.

Showings of the film are restricted to professional audiences. Organizations may borrow the film from Lederle Laboratories Film Library, Pearl River, N. Y., or from the Illinois State Medical Society, 360 N. Michigan Ave., Chicago 60601.

SPECIAL PUBLICATIONS

What Goes On in Illinois

What Goes On in Illinois is a calendar of medical and scientific meetings conducted in Illinois and adjacent states. It contains information about conventions, medical meetings, seminars and short courses conducted by educational institutions, hospitals, specialty societies, and voluntary health organizations. Published by the Illinois State Medical Society under a grant from Lederle Laboratories, What Goes On in Illinois is mailed to all doctors in Illinois and other interested persons nine times a year. Combined issues are published in June-July, August-September and November-December.

Program chairmen of organizations or institutions sponsoring scientific meetings open to medical and paramedical personnel outside of their own membership are invited to submit pertinent information to What Goes On In Illinois, c/o the Illinois State Medical Society, 360 N. Michigan Ave., Chicago 60601. Deadline for copy is 35 days in advance of publication.

Pulse

Pulse is a monthly newsletter published by the Illinois State Medical Society under a grant from Roche Laboratories, Division of Hoffmann La-Roche, Inc. It is distributed to all doctors in the state, to members of the Woman's Auxiliary and Illinois Medical Assistants Association, and is

supplied in quantity to hospitals for interns, residents and other personnel.

Pulse carries non-scientific news, photographs and feature materials of interest to the medical profession in Illinois. A special section is devoted to the activities of the Woman's Auxiliary.

The Relative Value Study

The Relative Value Study, undertaken by the Relative Value Committee, was completed, printed, submitted to and approved by the ISMS House of Delegates in 1964. Copies of the study are available from the Society. The study is a compilation of unit values referred to as relative value indexes, which were derived from average fees reported by Illinois physicians for services rendered to patients.

The primary purpose of the Relative Value Study is to provide individual physicians with a reliable factual guide for evaluating their own services.

The 1961 House of Delegates authorized the study and approved it with modifications at the 1963 annual meeting. The statistical techniques employed in this study, the data resulting therefrom, the wealth of information contained in the study itself and its adaptability make the study superior to similar studies previously undertaken.

Comb-1 Insurance Form

Because of the variety of data required for health insurance claims, the Comb-1 Form was developed jointly by the American Medical Association and the Health Insurance Council to simplify and reduce the number of attending physicians forms equally acceptable to the health insurance industry and the medical profession.

Information requested by many diverse forms from a large number of insurance companies was first classified and minimum needs for claim purposes were determined. Then appropriate and clearly worded questions were developed and arranged in a standard sequence, to facilitate completion. Out of this came two basic forms, one for group health insurance and one for individual health insurance, and four abbreviated forms. A further simplification involved devising an all-purpose form which is a combination of the group and individual forms—the Comb-1 Simplified Health Insurance Claim Form.

These forms are available to physicians from the Illinois State Medical Society and should be substituted for any non-standardized forms received. Each physician has been asked to voluntarily adopt the following procedure:

- When a physician receives a form from an insurance company bearing the HIC symbol it should be completed and returned to the company.
- 2) When a physician receives a form not identified by the HIC symbol, the standardized form should be filled out and clipped to the unacceptable form with both forms returned to the insurance company.
- 3) If the insurance company insists upon having its own form completed, the doctor should feel justified in making a reasonable charge for the added work involved in handling the non-standardized form.

The attempt to standardize these forms is an aid in cutting back on the ever-increasing load of paper work involved in medical practice. Forms are available without charge from the ISMS Division of Public Relations Economics while the supply lasts.

Disaster Hospital Manual

The responsibility of providing immediate medical and hospital care in disasters of any magnitude falls directly on physicians, nurses and hospitals. To aid Illinois communities in developing disaster plans, the ISMS Committee on Disaster Medical Care has adopted a model emergency plan for hospitals.

Originally developed by the Memorial Hospital of DuPage County, Elmhurst, the plan is recognized as a model by the Office of Defense Mobilization in Washington, D. C. Copies are available from the Society.

Medical Career Recruitment Programs

As man has advanced his life expectancy, it follows that many additional young men and women are and will be needed as members of the health team. Youth must be counseled early in their academic years in order to receive the proper educational background for a doctorate of medicine or allied health field degree.

The Woman's Auxiliary of the ISMS has been the spearhead force in Illinois to interest and recruit the youth of the state in medical careers. Members are asked to aid this effort by investigating the possibility of conducting or participating in career days in their home communities.

A pamphlet entitled "The Opportunities and Rewards of Medicine Can Be Yours" and a "Career Information Form" are available from the Society.

SCIENTIFIC SPEAKERS BUREAU

The Illinois State Medical Society, through its Scientific Speakers Bureau, aids county societies in their efforts to keep members abreast of medical advances. Sponsored by the ISMS Committee on Continuing Education, the bureau helps local groups arrange and conduct postgraduate medical education programs in their own areas. This assistance includes obtaining speakers, helping them with travel arrangements, preparing and mailing notices of meetings, and paying an honorarium and travel expenses. ISMS can also provide publicity services upon request.

It also pays a \$50 honorarium and expenses for individual speakers obtained by county medical societies for their regular meetings.

The Bureau operates under a grant from Merck, Sharp & Dohme, which provides funds to the ISMS Educational and Scientific Foundation for the specific purpose of obtaining speakers for county medical society meetings.

The following procedures govern use of the

Bureau:

- 1) County societies select speakers from a roster containing the names of more than 400 speakers and over 1,000 topics.
- 2) Eight weeks advance notice is required for postgraduate meetings. Requests for such meetings, which usually are scheduled for an entire afternoon, should be sent to the chairman of the Committee on Continuing Education, Illinois State Medical Society, 360 N. Michigan Ave., Chicago.
- 3) Publicity to media in the area of the meeting will be handled by ISMS upon request of the county society.
- 4) Postcard notices will be mailed to physicians in the county if requested. ISMS will prepare and mail notices if the information is received no less than three weeks prior to the meeting.
- 5) The county medical society program chairman and the speaker are both expected to submit to ISMS a report on the meeting and the arrangements.

PHYSICIANS PLACEMENT & STUDENT LOAN FUND PROGRAM

The Illinois State Medical Society not only offers help to students who wish to become physicians, but also is able to assist the careers of those already licensed to practice medicine.

The society provides this aid through two spe-

cial activities. First is its own Physicians Placement Service. Second is the Illinois Medical Student Loan Fund Program that the society sponsors in conjunction with the Illinois Agricultural Association.

Physicians Placement Service

The Physicians Placement Service is designed to help physicians find a desirable area in which to establish practice or to relocate. The program's purpose is twofold, since it is interested also in helping those communities which demonstrate need of a resident physician.

More than 400 medical doctors have been placed through this program since its inception shortly after World War II.

The Physicians Placement Service maintains an up-to-date listing of some 150 "open" areas needing general practitioners. It maintains a similar listing of areas in need of specialists in a given field.

This service accepts requests from both physicians and communities for satisfactory placement. In addition, physicians are referred to the service by a number of organizations, among them the American Medical Association, the Illinois State Health Department and the Illinois Agricultural Association. Frequently, responsible citizens or overburdened physicians in a community will contact the service.

Another important function of the Physicians Placement Service is to assist small communities in developing programs to attract physicians.

The Physicians Placement Service sends a questionnaire to the applicant physician to obtain information on his educational background, his interests and preferences of type of practice. Upon return of the questionnaire, the physician is sent a complete list of openings. Each opening is detailed on its facilities for home life, office space, proximity to hospital facilities and other specifics. The physician is also sent bulletins with information on new locations as they develop.

The Physicians Placement Service offers its assistance to all qualified physicians who request it. An applicant need not be a member of the state medical society. There is no charge either to the physician or to the community seeking the services of this program.

Inquiries may be addressed to the Physicians Placement Service, Illinois State Medical Society, 360 N. Michigan Ave., Chicago, 60601.

Illinois Medical Student Loan Fund Program

The Illinois Medical Student Loan Fund Program is designed to help those who have what it takes to become a physician but lack sufficient financial resources or a recommendation for medical school. Since its inception in 1948, the program has helped over 125 qualified applicants to hurdle financial or borderline academic barriers to a medical education.

Loans to students in need are provided by joint contributions from the Illinois State Medical Society and the Illinois Agricultural Association. The program offers loans of \$625 per semester—up to a total of \$6,250 over a five-year period. A two per cent interest rate is charged semi-annually from the time the loan is received. The borrower must also insure himself for the entire amount of the loan and pay premiums on the policy. However, he has four years after receipt of his M.D. degree before the first principal payment is due.

The program also offers assistance to those who may not have financial difficulties but can't get into a "Class A" medical school because their college grades are marginal. The board representing the sponsoring organizations of the program can recommend 10 candidates annually to the University of Illinois College of Medicine in Chi-

cago. After careful screening to determine whether the applicant has the potential to make a good medical student, the board can recommend him for admittance on the basis of its investigation.

In return for this assistance from the Medical Student Loan Fund Program, the applicant must agree to practice medicine in an Illinois town—serving a rural population for five years. The applicant may select a town from an up-to-date list of communities which have demonstrated need and ability to support a physician, but choice is subject to approval by the program's board. The purpose of this agreement is to provide family doctors for the rural communities in Illinois.

To be considered for assistance from the Medical Student Loan Fund Program, an applicant must be recommended by the presidents of his home county medical society and farm bureau. Rules of eligibility require that an applicant be a male premedical student of at least three years college standing . . . an Illinois resident outside of Cook County . . . and that he take a medical college admissions test for review by the program's board.

The board of the Medical Student Loan Fund Program conducts its annual interview about Dec. 1 for those students who wish to enter medical school the following September. Those approved for assistance are accepted on a comparative and competitive basis. Information and applications may be obtained from Roy E. Will, secretary, Joint Medical Student Loan Fund Board, Illinois Agricultural Association, 1701 Towanda Ave., P.O. Box 901, Bloomington.

IMPARTIAL MEDICAL TESTIMONY

The Impartial Medical Testimony program, in which the Illinois State Medical Society participates, is designed to elicit objective medical truth and facilitate the equitable disposition of injury cases in the courts of Illinois.

As a technique of judicial administration, impartial medical testimony examiners are ordered by the court when there is evidence of a wide divergence of medical opinion in the injury which is subject to litigation. The introduction of the IMT examiner and subsequent examination of injuries provide the court with objective, impartial medical data for use in pre-trial conferences and in jury trials.

Authorization for the use of IMT examiners was established by the introduction of Illinois Supreme Court Rule 17-2 in September 1961.

In the new Supreme Court Rules which became effective January 1, 1967, the use of IMT examiners is authorized by Rule 215 (d) (1). One substantial change has been made in the Rule in order to allow the use of IMT examiners in any proper case. The Rule formerly was limited to personal injury actions. The new Rule states: "(1) A reasonable time in advance of the trial, the court may on its own motion or that of any party order an impartial physical or mental examination of a party whose mental or physical condition is in issue, when in the court's discretion it appears that such an examination will materially aid in the just determination of the case. The examination shall be made by a member or members of a panel of physicians chosen for their special qualifications by the Illinois State Medical

- (2) Examination During Trial. Should the court at any time during the trial find that compelling considerations make it advisable to have an examination and report at that time, the court may in its discretion so order.
- (3) Copies of Report. A copy of the report of examination shall be given to the court and to the attorneys for the parties.
- (4) Testimony of Examining Physician. Either party or the court may call the examining physician or physicians to testify. Any physician so called shall be subject to cross-examination.
- (5) Costs and Compensation of Physicians. The examination shall be made, and the physician or physicians, if called, shall testify, without cost to the parties. The court shall determine the compensation of the physician or physicians.
- (6) Administration of Rule. The Administrative Director and the Deputy Administrator Director are charged with the administration of the rule."

Illinois is distinquished in this matter by being the only state which has a court rule permitting the state-wide use of impartial medical testimony. The Illinois State Medical Society played a significant role in the creation and development of the IMT program. Impartial medical testimony in other states is limited to certain jurisdictions within the states.

To implement the IMT rule, the Illinois State Medical Society created a panel of impartial medical examiners. This panel is comprised of approximately 400 physicians who are grouped into 20 medical specialties. These IMT examiners were selected from approximately 4,000 nominated physicians. Composition of the panel is reviewed annually to maintain the highest standards for the courts of Illinois. The IMT examiners are selected from the panel in rotating-sequence.

When the program was begun in 1961, the IMT examiners were to be paid, on court approval of bills submitted, by the Illinois State Bar Association Foundation, which was the custodian and disbursing agent of a special IMT fund. This fund had been made possible by grants from the Ford, Wieboldt, Deere, Woods and Lilly Foundations. At that time, it was anticipated that the State would later assume the obligation of financing this program. In 1967, the State allotted \$12,000 for the biennium beginnnig July 1 through June 30, 1969. The funds will be disbursed by the Administrative Office of the Court.

In an appropriate case, the plan evolves as follows:

- judge invokes Rule 215 (d) (1) (when in his judgement introduction of an IMT examiner will aid materially in the equitable disposition of the case);
- judge contacts supreme court administrator, requesting IMT examiner (special forms are used for this purpose);
- court administrator contacts Illinois State Medical Society for IMT examiner, as required by the character of the injury;
- ISMS selects an IMT examiner from the panel of the medical specialty relating to the injury involved;
- 5) ISMS relates the identity of the IMT examiner to the court administrator;
- 6) court administrator schedules the examination of the plaintiff, and obtains pertinent medical records for the IMT examiner.
- IMT physician examines plaintiff, and prepares medical report. This report is submitted to the court. Copies are prepared for the attorneys involved.

- 8) IMT examiner is available for court testimony, as required.
- 9) IMT examiner submits bill to the Administrative Office of the Court.

The Illinois State Medical Society is deeply ap-

preciative of its role in offering, in conjunction with the Supreme Court, this impartial medical service for the courts of Illinois. The IMT Committee of the state society is charged with the responsibility of implementing the IMT Rule, as required by the court.

INSURANCE PROGRAMS

Retirement Investment Program

The Board of Trustees of the Illinois State Medical Society has approved the Retirement Investment Program which makes available to members a means of providing for retirement with group advantages an individual physician could not otherwise obtain. The group annuity and mutual fund portion of the program may also be used as funding vehicles for Keogh qualified investment if so desired. The Tax Qualified Retirement Program (Keogh) and the Retirement Investment Program permit balanced investments to counter economic fluctuations.

Annuities or mutual funds alone do not meet the problems of recession and inflation, but together they do permit a sound retirement plan.

The group annuity provides a guaranteed lifetime income at retirement, serving as a hedge against periods of recession or declining prices, while the mutual fund provides an opportunity for common stock investment serving as a hedge against periods of inflation or rising prices.

A member physician wishing this type of retirement protection may obtain it through the Illinois State Medical Society. By doing so he not only receives advantages he would not otherwise have but he is able to benefit from the collective opinions and research facilities of the insurance company and the mutual fund's investment advisor.

The Retirement Investment Program making available the group annuity at a substantial reduction in premium, and the mutual funds, offered without sales commission load, is one of the most recent of its kind and was developed after several years of study taking into consideration other group plans and retirement alternatives.

The size of the retirement contribution, the proportion of investment between the group annuity and the mutual fund, and the retirement age are determined by the participating physician.

The Continental Illinois National Bank and Trust Co. of Chicago receives all physicians' contributions, and maintains records.

Group Annuity

The group annuity, underwritten by the Continental Assurance Co., participates in dividends which are reinvested annually at compound interest.

The group annuity may provide an insurance death benefit and a total and permanent disability guarantee. In the event of death prior to retirement, a member's beneficiary would receive the death benefit or the cash value of the annuity whichever is greater.

Six options for settlement at retirement are available under the annuity. The most frequently chosen is the life income option which guarantees a base income for life that can never be outlived. With the increase of life expectancy there is a danger of depleting capital during advanced years. However, the group annuity assures, at least, a base or fixed income which cannot be outlived. Of equal importance, is the fact that settlement may be arranged under the group annuity to guarantee at least a return of the member's investment to his beneficiary if he elects a life income and dies shortly after retirement.

Mutual Fund

The no load open end mutual fund, consisting primarily of common stocks, is managed by Stein Roe & Farnham of Chicago, which has been serving as investment adviser to pension and profit sharing trusts, trustees, individuals, and other investors since 1932.

The Stein Roe & Farnham Stock Fund is quoted daily in most major newspapers and the Wall Street Journal. The fund has no sales commissions. The investment adviser receives a quarterly management fee of $\frac{1}{2}$ s of 1 per cent of the average net asset value of the fund. Management fees are common to all mutual funds and are distinct from sales loads.

Group Disability Program

The Illinois State Medical Society has officially approved a group disability program which is available to all eligible members of the ISMS up to age 70 who are regularly attending all of the usual duties of their occupation. Three different types of coverage are available under the program, with an over-70 conversion privilege.

Benefits of the program are payable regardless of any other insurance and no restrictive riders may be attached. The master contract contains a special renewal condition whereby the individual coverage cannot be terminated.

Provision has been made for an adjudication committee to advise the carrier on claims and other administrative problems. The adjudication committee will review the medical data and make recommendations regarding coverage which the insurance company might otherwise reject.

The program is explained in detail in a brochure which is available by writing to Parker, Aleshire & Co., 9933 Lawler Ave., Skokie.

Group Major Medical Expense Plan

The \$15,000 Group Major Medical Expense Plan designed for the Illinois State Medical Society has a 20% co-insurance feature and a \$500 or \$1,000 deductible, whichever the physician selects. For hospital room and board, the Plan will pay up to \$30 a day and up to \$45 a day in an intensive care unit. It will pay \$20 a day in a convalescent home following release from a hospital up to 90 days. The Plan also provides maximum coverage for the insured in the event of mental illness and up to \$2,000 for dependents. It will also cover a congenital anomaly from the first day of birth after the effective date of the contract up to \$2,000.

New members joining the Society will be allowed to enroll without evidence of insurability or a health statement under age 40 within six months after notification of the Plan's availability.

The Group Major Medical Expense Plan is outstanding and will provide members with protection against catastrophic illness.

The Plan is underwritten by the Commercial Insurance Co. of Newark, N.J., and is administered by Parker, Aleshire & Co., Skokie. Additional information may be obtained from the Illinois State Medical Society, Division of Public Relations and conomics.

Tax-Qualified Retirement Program

As mentioned above, the Board of Trustees has also approved the Society's Tax-Qualified Retirement Program, which utilizes a Continental Assurance Company Group Annuity and the Stein Roe & Farnham Stock Fund. This Program is intended for members who may find the provisions of the Keogh Act to their advantage. A recent liberalization, effective in 1968, which will

allow contributions made by self-employed physicians to be fully deductible is expected to make this Program more attractive to the membership. The principal provisions of the Koegh Act are as follows:

- A self-employed physician may set aside 10% of his net income from the practice of medicine or \$2,500.00 whichever is the lesser, each year for his own retirement.
- A self-employed physician may currently (1967) deduct ½ of this amount from his income tax. Effective in 1968 he will be able to deduct the entire amount.
- 3. A self-employed physician must include all full time employees with three or more years service under the Plan. A full time employee is defined as an employee working twenty hours or more a week for a period of five or more months. The employee's contributions are made by the physician as a percent of salary at least equal to that percentage of net income put aside by the physician for his own retirement.
- Funds invested under the Tax-Qualified Retirement Program accumulate tax free until distribution.

Continental Illinois National Bank & Trust Company of Chicago acts as Trustee for the Program's Annuity and Stock Fund shares and receives all physicians' contributions and maintains the Program's records.

Members wishing additional information on the Retirement Investment Program and the Tax-Qualified Retirement Program may write the Illinois State Medical Society, Division of Public Relations and Economics, 360 N. Michigan Ave., Chicago 60601.

PRECEPTORSHIP PROGRAM

A pilot preceptorship program was inaugurated during the summer of 1967 by the Illinois State Medical Society in DuPage County.

The program, started at the request of LeRoy P. Levitt, M.D., dean of the Chicago Medical School, serves as an extension course for senior medical students at the school.

Working directly with preceptor doctors, the students see patients in the office, make rounds of four hospitals in DuPage County as well as Community Hospital in Geneva, and go on house calls.

In addition to being exposed to the art and science of family practice, the students also spend a few days with selected specialists in the hospitals and with the health department and other community health agencies.

RADIO-TV PUBLIC SERVICE MATERIALS

Radio materials available from the Illinois State Medical Society include:

- "Today's Health Tip"—a new 30-second health message every day. Available on records (30 messages per record) which feature the voice of Dr. "SIMS." For added local appeal scripts are also available which can be read by local announcer or physician.
- "Medical Interview"—a five minute weekly interview series featuring a different doctor each week, discussing subjects on practical health matters in language the layman can understand.

Television materials currently include one-minute animated spots on the subjects of measles, arthritis quackery, and rheumatic fever. Subsequent spots stressing preventive medicine will be produced during the course of the year.

In addition, the Division of Public Relations maintains a radio and television speakers' bureau, which obtains physician-speakers for radio and television interview shows on request.

Doctor's Responsibility to the Press

Physicians and the press are partners in providing a ling of communication between the medical profession and the public. But, the press cannot carry out its traditional responsibility in informing the public in the area of medical and patient news without the cooperation of the medical society and individual doctors. The inevitable penalty of silence by the doctors is public ignorance, misunderstanding and fear. In a democracy, public ignorance, misunderstanding and fear can be dangerous to professional freedom.

The following outline—based on a press code adopted by the Macon County Medical Society—is suggested as a pilot guide for individual physicians and county societies in Illinois.

Availability

- 1) The officers, committee chairmen or designated spokesmen of county medical societies shall be available at all times to mass media personnel to provide authentic information on medical subjects.
- A list of current spokesmen shall be supplied by county societies to the executives of every

newspayer, radio and television station in the country.

3) These spokesmen may be quoted by name. They should not be considered by their colleagues as self-seeking, since authoritative attribution is done in the best interests of the public and the profession. (In addition, physicians are private citizens and as such are the subjects of news stories in their social and civic activities just like any other citizen.)

Physician News

Physicians, as scientists, are encouraged to give newspaper interviews and appear on radio and television programs on medical subjects. Physicians may report on new or unusual diseases or treatments within an ethical framework. In these instances, they should, whenever possible, notify their county society publicity chairman or the Illinois State Medical Society.

Physicians may be asked to comment as individuals on politically controversial subjects (such as socialized medicine). In this event, the physician should clearly indicate that he is expressing his personal viewpoint which should not be construed as a statement of medical society policy.

A medical society officer, however, should remember that any comment he makes—whether or not intended as personal viewpoint—is generally accepted as official policy.

Patient News

As the patient's personal physician, the doctor has an obligation to respect confidences that come to him in the performance of his duty and may not release news except with the patient's consent or those authorized to speak for him. When the press learns of the illness of private patients from other sources, the physician may cooperate with the press in answering any inquiries in the interest of accuracy and to avoid embarrassment.

When news of patients is of such a nature that it automatically falls in the public domain, physicians should feel free to release information within the framework of this code.

Patient information may be given where the nature of injuries, illness or treatment is of special interest. The report of such information shall be more in the nature of scientific information, rather than an exposé of an individual affliction.

MEDICAL SELF-HELP TRAINING PROGRAM

The Disaster Medical Care Committee of the Illinois State Medical Society strongly endorses the training of at least one person in each family on procedures to follow in the event of a medical emergency. This would be of value not only in the event of an atomic disaster, when physicians would not be available, but also in caring for other emergencies until the help of a physician can be obtained.

For this reason the Society presented "Medical Self Help Training" as an official television course over educational Channel 11 in Chicago early in 1964 and again in 1965. Over 10,000 persons enrolled in this course. Response was so enthusiastic that films of the complete 15-part, 7½-hour series have been made available to county medical societies, industries, schools, and television stations throughout the state.

For complete information on this film course, as well as a "live" course for group study presentations, write the Public Relations Division of the state society.

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ILLINOIS' REVISED VITAL RECORDS-1968

Revised forms for recording births, deaths, fetal deaths, marriages and divorces, developed by the Illinois Department of Public Health, will be introduced Jan. 1, 1968. Major revisions of vital records occur approximately every 10 years to coincide with the revised recommendations of the United States Public Health Service on the content of vital records. These recommendations to the states, known as the "standard certificates," along with the international classification of diseases, are the two most important instruments for achieving the nationwide comparability and consistency that are so essential in the interpretation of vital statistics data.

A great deal of study and planning have gone into the 1968 Illinois revision. The topic of standard certificates appeared on the 1962 agenda of the biennial Public Health Conference on Records and Statistics, held in Washington, D. C. Since that time resource organizations, medical societies, hospitals, administrative organizations, law enforcement agencies and many other groups have been contacted for suggestions and recommendations. State and local registrars of vital statistics, statisticians, and other consultants served on study committees to develop specific recommendations to the United States Public Health Service on content and format.

Additional work was required to adopt these standard certificates to Illinois laws and practices. Valuable assistance and advice was obtained from a variety of special committees. Included were the Vital Statistics Committee of the Illinois State Medical Society and special committees of the Illinois Hospital Association, the Illinois Association of Medical Record Librarians, the Family Law Section of the Illinois State Bar Association, the Illinois Coroners Association, the Illinois Funeral Directors Association, the Illinois Association of County Clerks and Recorders, and the Administrative Office of the Illinois Courts.

The Illinois certificates of live birth and fetal death contain a section for healh and statistical use only. Much of this information has not heretofore been collected, but the needs for data are mounting daily. It is vital, therefore, that the makers of certificates and the persons about whom they are made understand their importance, and understand that these items do not appear on certified copies of the certificate and will not be released by the official custodian of the certificate except upon court order.

The race and education of parents are used with other information on the certificate to evaluate the effect of socio-economic factors. Because of differences in these socio-economic factors, various groups in the population have different birth characteristics. By statistical analysis of

these characteristics, the influence of social factors on fertility and infant survival can be studied and the social and health problems of these groups can be evaluated.

The number of previous deliveries, both births and fetal deaths, assists in estimating further birth rates and examining the effect of changing social and economic conditions on the number of children couples decide to have.

The dates of the mother's last live birth and last fetal death allow studies of the time interval between children. Understanding patterns of child spacing practices is necessary to interpret changes in birth rate trends. In addition, the outcome of a pregnancy following a fetal death is of interest to physicians and other medical research workers.

The weight of a fetus is closely related to its gestational age. The date of last normal menses also is used to calculate gestational age, which is useful in the study of fetal loss. The month of pregnancy in which a mother began her prenatal care and the number of prenatal visits she had are also related to the outcome of pregancy as well as to her own health. Thus, these items are important to those interested in improving health and medical services for mothers and babies.

Illegitimate births are an important social problem. The item about legitimacy helps to measure the extent of the problem so that medical and social programs can be designed to effectively assist unwed mothers.

The other items in this section are similarly useful for statistical research and for medical purposes.

Along with the introduction of revised vital records, the Illinois Department of Public Health will release special handbooks giving complete instructions on the preparation and filing of certificates of birth, death and fetal death. These handbooks will consist of a Hospital Handbook on Birth and Fetal Death Registration; a Funeral Directors Handbook on Death and Fetal Death Registration; and a Physicians Handbook on Medical Certification: Death, Fetal Death, Birth. A Manual for Coroners is already in use but will be revised to incorporate certain new instructions sometime during 1968.

The Illinois Department of Public Health will distribute the revised vital record certificates through the offices of its local registrars late in December 1967. It is imperative that only the new certificate forms be used on and after Jan. 1, 1968 and that all previous certificate revisions be destroyed. It is therefore extremely important that local registrars of vital statistics cooperate fully in the distribution of all new certificate forms prior to Jan. 1, 1968 in order to make this transition successful.

Women's Auxiliary To The Illinois State Medical Society

The Woman's Auxiliary to the Illinois State Medical Society was organized in 1927, 40 years ago. Mrs. G. Henry Mundt, of Chicago, was the first President. Since then, 37 dedicated and loyal physician's wives held this high office. Each added ingenuity, her talents, and her way of serving the Auxiliary under the guidance of the Advisory Council of the Illinois State Medical Society.

It is with respect and admiration that I listen to the accounts of the activities that took place during the past 40 years. Although our programs and procedures have changed, the basic and fundamental objectives of the Auxiliary remain the same. Perhaps that is the reason that during these forty years, our by-laws have been amended only four times and revised only twice.

The last half century brought with it tremendous changes in applied scientific knowledge, in economics, and perhaps the greatest changes have been in the patterns of human behavior. It is no wonder therefore, that an essential service such as medical care, is in the midst of change. Change in its method of administration and change in distribution of its services. Many other old and trusted social, financial, and economic institutions have been challenged, and have undergone or are now undergoing changes. How then, can we, as doctor's wives, help insure for our children the free American way that we have known?

Our medical society tells us that the doctors and their wives must make their wishes known in the community and thus become more effective in their Legislative efforts. They must join the Political Action Committees of the state. It is essential to continue supporting the American Medical Education and Research Foundation programs. It is essential they become involved with other educational and social agencies to accelerate health career recruitment. It is essential to learn about the community's health problems. And in co-operation with other agencies in the community, these problems must be solved.

Mrs. Karl F. Ritter, our national president, stated in her scholarly inaugural address that, "Ingenuity, hard work and careful planning have produced fantastic results in all fields of our program." Mrs. Ritter urged "Continued dedication to our Auxiliary goals," and asked for "cooperation with one another and with other groups in the community."

In conclusion, I would like to repeat what Dr. Blasingame, Executive Vice President of the AMA, has stated, "Never before has organized medicine so needed the individual physician and auxiliary member. . . . Never before has the individual physician so needed organized medicine and the Auxiliary."

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ILLINOIS STATE GOVERNMENT

The state government is divided into three branches—legislative, executive, and judicial. The legislative power is vested in the General Assembly, which is composed of the State Senate and the House of Representatives (a bicameral assembly).

For representation in the General Assembly, there are 58 senatorial districts and 59 representative districts. Each senate district elects one senator; each representative district elects three representatives. Thus, the Senate has 58 members and the House 177. The senators are elected for four-year terms, and the representatives serve two-year terms. Under normal procedure, Senators in the districts having even numbers are elected in Presidential election years; those in districts with odd numbers are chosen at elections in the intervening even-numbered years. However, recent requirements for reapportionment have created changes in this pattern.

The General Assembly normally meets in the first six months of each odd-numbered year, although may be called into special session by the Governor. The General Assembly's functions are to enact, amend, or repeal laws or adopt appropriation bills, act on amendments to the United States Constitution, propose and submit amendments to the State Constitution, and to act to remove public officials.

When the House of Representatives is organized, a Speaker or presiding officer is elected for the biennium. The presiding officer of the Senate is the Lieutenant Governor. To facilitate the handling of legislation, the members of the Senate and House are assigned to designated committees to consider bills of like subject matter. These committees usually hold public hearings to discuss legislation before the measure is taken up by the entire House or Senate. There are approximately 50 committees.

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LEGISLATIVE BRANCH

Legislative Procedure

Each member of the General Assembly has the right to introduce bills or resolutions. After the introduction of the bill, it is referred to the appropriate committee. If the committee recommends the bill favorably, it is read a first time, usually by title, before the house, in which it was introduced. A second reading must be held on a separate legislative day when amendments to it can be offered for consideration by the entire membership. The bill will then be given a third and final reading when it is acted upon by the entire membership of the house that is considering it.

Action by Both Houses

To pass, the bill must receive the favorable vote of the majority of the members elected (89 in the House; 30 in the Senate). These bills are then sent to the other house where essentially the same procedure is followed.

If, because of amendments in the second house, there are two versions of the same bill, conference committees may be appointed to work out the differences. Both houses must vote favorably on the same version of the bill before it can be sent to the Governor for his consideration.

If the Governor thinks the bill should become a law, he can either sign it or file it with the Secretary of State without his signature. If the Governor decides it would be unwise for the bill to become law, he can veto it. If he vetoes the bill, he must file a statement of objections. Two-thirds of the members elected to the House can override the veto. He can also veto specific items of an appropriations bill.

Appropriation Bills

"Bills making appropriations of money out of

the treasury shall specify the objects and purposes for which the same are made, and if the Governor shall not approve any one or more of the items or sections contained in any bill, but shall approve the residue thereof, it shall become a law as to the residue in like manner as if he had signed it. The Governor shall then return the bill with any objections to the items or sections of the same not approved by him to the House in which the bill shall have originated, which House shall enter the objections at large upon its journal and proceed to reconsider so much of said bill as is not approved by the Governor. Any item or section of said bill not approved by the Governor shall be passed by two-thirds of the members elected to each of the two Houses of the General Assembly, it shall become part of said law, notwithstanding the objections of the Governor. Any bill which shall not be returned by the Governor within ten days, Sundays excepted after it shall have been presented to him, shall become a law in like manner as if he had signed it, unless the General Assembly shall, by their adjournment, prevent its return, in which case it shall be filed with his objections in the office of the Secretary of State within ten days after such adjournment or become a law." (Article V, Section 16, Illinois Constitution)

NOTE

A Legislative Directory containing the names and addresses of all members of the 75th Illinois General Assembly and the Illinois Senators and Representatives in the Congress is available. Requests should be directed to: Illinois State Medical Society, Regional Office, 520 S. Sixth St., Springfield, 62701.

EXECUTIVE BRANCH

The Constitution provides that the Executive Department shall consist of the Governor, Lieutenant Governor, and Secretary of State, Auditor of Public Accounts, Treasurer, and Superintendent of Public Instruction, and Attorney General. All of these officials are elected for four-year terms. The Treasurer is the only elected state official who cannot succeed himself.

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Division of Tuberculosis Control Clifton Hall, Chief

Alvin B. Grant, Public Health Advisor, USPHS Chicago State Tuberculosis Sanitarium—Herbert Neuhaus, Medical Director and Superintendent

Mt. Vernon State Tuberculosis Sanitarium— Morris Zelman, Acting Medical Director and Superintendent

Division of Local Health Services

Charles F. Sutton, Chief Claire E. Healey, Assistant Chief E. E. Diddams, Executive Assistant

E. E. Diddams, Executive Assistant Sections on:

Civil Defense—Robert F. Heggie, Civil Defense Coordinator, USPHS

Mary O'Donnell, Medical Self-Help Consultant

Cleve Taylor, Public Health Advisor, USPHS Community Health Services Promotion—Harold K. Fuller, Head

Illinois State Wide Public Health Committee
Harold K. Fuller, Executive Secretary

Regional Offices

Northeastern Region (I)—Ruth L. Wiener, R.N., M.P.H. (Acting), 48 W. Galena Blvd., Aurora 60504. Counties of Boone, Kane, Kankakee, LaSalle and consultation to full-time health departments of Cook, DeKalb, DuPage, Grundy, Lake, McHenry, Will, and Winnebago Counties; Berwyn Township Public Health District, Evanston-North Shore, Rockford, Oak Park, Hygienic Institute of LaSalle-Oglesby-Peru, and Stickney Township Public Health District.

EAST CENTRAL REGION (II)—Russell L. Bryant, B.S. (Acting), 301 W. Birch St., Champaign 61820. Counties of Champaign, Clark, Coles, Crawford, Cumberland, Edgar, Ford, Iroquois, Jasper, and Moultrie and consultation to full-time health departments of DeWitt-Piatt, Douglas, Effingham, Livingston, McLean, Shelby, Vermilion and to the Champaign-Urbana Public Health District.

Northwestern Region (III)—W. Keith Weeber, (Acting), 121 Fourth Ave., Rock Island 61201.

Counties of Hancock, Henderson, Knox, Marshall, McDonough, Putnam, Stark, Tazewell, Warren, and Woodford and consultation to full-time health departments of Bureau, Carroll, Henry, JoDaviess, Lee, Mercer, Ogle, Peoria, Stephenson, and Whiteside, and to the city of Peoria.

WEST CENTRAL REGION (IV)—W. M. Talbert, M.D., M.S.P.H., 1124 S. Fifth St., Springfield 62706. Counties of Brown, Cass, Clinton, Fayette, Greene, Logan, Macoupin, Madison, Mason, St. Clair, Sangamon, Schuyler, and Scott and consultation to full-time health departments of Adams, Bond, Calhoun, Christian, Fulton,

Jersey, Macon, Menard, Montgomery, Morgan, and Pike and the East Side Health District to Canteen-Centreville-East St. Louis-Stites townships.

SOUTHERN REGION (V)—Elvin L. Sederlin, M.D., P.O. Box 722, Carbondale 62901. Counties of Edwards, Hamilton, Jefferson, Marion, Monroe, Perry, Richland, Wabash, Washington, and Wayne and consultation to full-time health departments of Clay, Egyptian, Gallatin-Saline-White, Franklin-Williamson, Jackson, Lawrence, Quadri-County, Hardin-Johnson-Massac-Pope, Randolph, Tri-County, Alexander-Pulaski-Union counties.

County and Multiple-County Health Departments

- Adams County, Wayne Messick, M.P.H., 333 N. 6th, Quincy 62301
- BOND COUNTY, Mrs. Ruth Perkins, R.N., 100 N. Locust, Greenville 62246
- BUREAU COUNTY, Mrs. Marjorie A. DeBord, R.N., Hotel Clark, Princeton 61356
- CALHOUN COUNTY, Mrs. Margaret Hillen, R.N., Hardin 62047
- CARROLL COUNTY, Mrs. Margaret Veme, R.N., Mt. Carroll 61053
- CHRISTIAN COUNTY, Glen F. Weber, 106 E. Main St., Taylorville 62568
- CLAY COUNTY, E. D. Foss, M.D. 104½ W. Second St., Flora 62839
- COOK COUNTY, John B. Hall, M.D., M.P.H., 1425 S. Racine Ave., Chicago 60608
 - North District, 1755 Oakton St., DesPlaines 60018
 - South District, 51 E. 154th St., Harvey 60426 Southwest District, 5410 W. 95th St. Oak Lawn 60453
 - West District, 1907-09 Rice St., Melrose Park 60160
- DEKALB COUNTY, Mrs. Audre Anderson, R.N., 1731 Sycamore Rd., DeKalb 60115
- DEWITT-PIATT Bi-County, Lelia V. Hyde, R.N., 122 E. Main St., Clinton 61727
- Piatt County, Courthouse, Monticello 61856 Douglas County, Mary Lou Pflum, R.N., P.O.
- Box 382, Tuscola 61953 DuPage County, Charles A. Lang, M.D., M.P.H.,
- 222 E. Willow Ave., Wheaton 60187
 EFFINGHAM COUNTY, Peter C. Supan, M.D.,
- M.P.H., 112 E. Section Ave., Effingham 62401 EGYPTIAN (Gallatin-Saline-White Counties) Ann E. Clarke, M.D., 1333 Locust St., Eldorado
 - White County, 208 N. Church, Carmi 62821 Gallatin County, Courthouse, Shawneetown 62984
- Franklin-Williamson Bi-County, David P. Richerson, M.D., M.P.H., 217 E. Broadway, Johnston City 62951
 - Franklin County, 226 N. Main, Benton 62812

- Fulton County, Wilma Sturgeon, R.N., 31 S. Main St., Canton 61520
- GRUNDY COUNTY, Mrs. Mary C. Reed, R.N., Court House, Morris 60450
- HENRY COUNTY, Grace Van Vooren, R.N., Court House Annex, Cambridge 61238
- Jackson County, Harold H. Rohrer, M.D., M.P.H., 1015½ Chestnut St., Murphysboro 62966
- JERSEY COUNTY, Mrs. Nola Kramer, R.N., Court House, P.O. Box 69, Jerseyville 62052
- Jo Daviess County, Albert L. Hildinger, M.D., 311 S. Main St., Galena 61036
 - KENDALL COUNTY, Mrs. Nancy J. Larson, R.N., Yorkville 60560
- LAKE COUNTY, John J. Ring, M.D., 2307 Grand Ave., Waukegan 60085
 - West Suboffice, 330 N. Milwaukee Ave., Libertyville 60048
- LAWRENCE COUNTY, Maxine Jackman, R.N., Court House, Lawrenceville 62439
- LEE COUNTY, E. S. Parmenter, M.D., 316 W. Third St., Dixon 61021
- LIVINGSTON COUNTY, Mrs. Ann M. Lavin, R.N., Rm. 418, Bank of Pontiac Bldg., Pontiac 61764
- MACON COUNTY, Leo Michl, Jr., M.S., 1085 S. Main St., Decatur 62521
- MCHENRY COUNTY, Mrs. Eileen Hanson, R.N., 209 N. Benton St., Woodstock 60098
- McLean County, R. E. Baxter, M.D., 401 W. Virginia Ave., Normal 61761
- MENARD COUNTY, Mrs. Norma W. Fulton, R.N., Court House, Petersburg 62675
- MERCER COUNTY, Mrs. Twila M. Tweed, R.N., Court House, Aledo 61231
- Montgomery County, Willis L. Whitlock, Box 149, Hillsboro 62049
- MORGAN COUNTY, Rosario F. Sison, M.D., 2341/2 W. State St., Jacksonville 62650
- OGLE COUNTY, Mrs. Esther J. Appler, R.N., 106 S. Fifth St., Oregon 61061
- PEORIA COUNTY, Fred Long, M.D., M.P.H., 2114 N. Sheridan Rd., Peoria 61604
- PIKE COUNTY, Mrs. Martha Lowry, R.N., Court House, Pittsfield 62362

QUADRI-COUNTY (Hardin-Johnson-Massac-Pope Counties), John J. Cipolla, M.S.P.H., Box 437, Golconda 62938

Massac County, Courthouse P.O. Box 133, Metropolis 62960

Johnson County, Vienna 62995

Hardin County, Gross Bldg., Elizabethtown 62931

RANDOLPH COUNTY, Mrs. Marilynn Murphy, R.N., County Building, Sparta 62286

ROCK ISLAND COUNTY, John Schneider, Court House Rock Island 61201

SHELBY COUNTY, Peter C. Supan, M.D., M.P.H., 123 N. Broadway, Shelbyville 62565

STEPHENSON COUNTY, Mrs. Fern M. Brown, R.N., Corn Belt Bldg., 12 N. Galena Rd., Freeport 61032

TRI-COUNTY (Alexander-Pulaski-Union Counties), Margaret Cotton, R.N., 1115 Cedar St., Cairo 62914

Union County, Jonesboro 62952

VERMILION COUNTY, Mrs. Helen Armantrout, R.N., 808 N. Logan, Danville 61833

WHITESIDE COUNTY, Mrs. Romona Stene, R.N., 201 W. First St., Rock Falls, 61071

WILL COUNTY, Herbert S. Miller, M.D., M.P.H., 21 E. Van Buren St., Joliet 60431

WINNEBAGO COUNTY, Arthur E. Sulek, M.D., M.I.H., 425 W. State St., Rockford 61101

Urban Health Departments

Berwyn Health Department, Henry S. Swiontek, M.D., 6600 W. 26th St., Berwyn, 60402

Champaign-Urbana Public Health District, L. L. Fatherree, M.D., M.P.H., 505 S. Fifth St., Champaign 61802

Chicago Board of Health, Samuel L. Andelman, M.D., M.P.H., Chicago Civic Center, Chicago 60602

East Side Health District (Canteen-Centreville-East St. Louis-Stites Townships), John J. Gregowicz, M.D., 638 N. 20th St., East St. Louis 62205

Evanston-North Shore Health Department, Allan A. Filek, M.D., M.S.P.H., Box 870, Evanston 60204

Hygienic Institute (LaSalle-Oglesby-Peru), Arlington Ailes, M.D., M.P.H., LaSalle 61301

Oak Park Department of Public Health, Herbert Ratner, M.D., Box 31, Oak Park 60303

Peoria Department of Health, Fred Long, M.D., M.P.H., 2116 N. Sheridan Rd., Peoria 61604

Rockford Department of Public Health, Arthur E. Sulek, M.D., M.I.H., City Hall Bldg., Rockford 61104

Stickney Township Public Health District, Gene J. Franchi, D.D.S., M.P.H., 5635 State Rd., Oak Lawn 60459

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(Allied with Public Health Operations)
Waterways, Drainage, Water Pollution and

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Rep. Carl L. Klein, Chicago, Chairman (new membership not yet confirmed)

PACKAGED DISASTER HOSPITALS IN ILLINOIS

ADAMS

Quincy-55080

General Stores Bldg., Soldiers & Sailors Home ALEXANDER

Cairo-55455

City Warehouse, 401 Ohio St.

BUREAU

Princeton—62466

City Hall, 2 S. Main St. Ref: Perry Memorial Hospital

CARROLL

Savanna—57264

Army Ordnance Depot, Savanna, Gen: Bldg. 413, Heated: Bldg. 127, Flam: Bldg. 938, Ref: Savanna Frozen Food Locker, 1817 Chicago Ave.

CHAMPAIGN

Champaign—62409

Illinois Power Company, 41 E. University, Ref: Un. Central Food Store: 1321 S. Oak

CHRISTIAN

Pana-55348

Township Bldg., 4th St., Flam: Pana Hospital, Ref: Seigert's Locker Plant

CLAY

Flora---57262

Old Power & Light Bldg., 221 W. South St.

Charleston-57265

Eastern Illinois University Book Store, 7th St., Basement, Ref: Pemberton Hall, Gen: Lanty Gym Charleston-62406

Jefferson Jr. High School, 801 Jefferson St., Ref: Higgins Grocery, 407-7th St. Mattoon—55254

Moody Mfg. Co., 1321 S. 19th St., Ref: Hornes Frozen Food, 301 S. 18th St.

Соок

Chicago Heights—55093

City Hall, 1431 Chicago Rd., Ref: St. James Hospital, Chicago Rd. & 14

Oak Forest-62410

Cottage #10, Oak Forest Hospital, 159 & Cicero Ave., Ref: South Bldg.

Oak Forest—62411

Cottage #10, Oak Forest Hospital, 159 & Cicero Ave., Ref: South Bldg.

Palatine—57782

Village Hall, 54 S. Brockway

Skokie-54028

G. D. Searle & Co., Bldg. K, Searle Pkwy.

Douglas

Tuscola-57266

Court House, Ref: Tuscola Locker Serv.

DuPage

Elmhurst—62412

DuPage Memorial Hospital, 315 Schiller

Wheaton-57330

County Convalescent Home, O.S. 370 County Farm Rd., Flam: County CD Office

EDGAR

Paris -- 62408

Houston Bldg., 120-126 E. Wood, Ref: Co. Locker Serv., 301 W. Blackburn

FRANKLIN

West Frankfort-55064

New Era Bldg., 105 S. Monroe, Ref: Ice Plant, 305 S. Logan

GRUNDY

Gardner—56035

Garfield Township Bldg., Flam: Fire Department Bldg.

HENDERSON

Oquawka-55083

Old Opera House, Ref: Wm. Lock's Tavern

Iroquois

Askum-55082

Lawson Contracting Co., Ref: Reichert Locker Jackson

Murphysboro—62469

Courthouse, 11th & Walnut, Ref: Memorial Hospital

JERSEY

Jerseyville—56016

Courthouse, Heat & Flam: Community Hosp., Ref: Ringhausen Cold Storage

KANE

Aurora-55353

East Aurora High School, 779-5th Ave., Ref: Aurora Locker Co., 36 N. Lincoln

KANE

Elgin-55076

Elgin State Hospital, Adm. Bldg., Ref: General Stores, Generator: Garage

St. Charles—55077

General: Bandstand Basement, Pottawatomie Park, All other: Delnor Hospital

KANKAKEE

Kankakee—55094

Park Div. Garage, 100-5th Ave., Ref: St. Mary's Hospital

Manteno-55081

Our Lady's Academy, 151 S. Main St., Ref: Kroger Food Store

Manteno-55087

Manteno State Hospital, Silvis Bldg. #1, Ref: & Inf: Gen. Stores Bldg.

Knox

Galesburg—55075

Knox County Courthouse, Cherry & E. South St., Heat: Ferris Furn. Storage Co. 471 S. Mulberry St., Ref: Galesburg Cottage Hospital Galesburg—55078

Galesburg State Research Hospital, Warehouse Bldg., N. Seminary St., Ref: Stores Bldg.

Galesburg-55079

Galesburg State Research Hospital, Warehouse Bldg., N. Seminary St., Ref: Stores Bldg.

LAKE

Highland Park-57263

Water Filtration Plant, 1701 St. John Ave.

LASALLE

Ottawa-55356

Libby-Owens Ford Glass Plant, SA: Old Post Office Bldg., 309 Madison, Ref: Ottawa Milk Product., 1219 Fulton St.

LEE

Dixon-55085

Dixon State School, Garages, 19-20-21, Ref: Basement, Gen. Stores

LIVINGSTON

Pontiac-62414

County Nursing Home, R.R. #1

LOGAN

Lincoln-55086

Lincoln State School, 816 S. State St., Ref: Stores Bldg.

Lincoln—55366

Lincoln Warehouse, 100 S. Sangamon, Ref: Cold Storage Bldg. & Lincoln State School

McLean

Normal—55091

Ill. Soldiers & Sailors, Children's School Hospital, Ref: General Stores

Macon

Decatur-55347

Macon County Building, 253 E. Wood, Ref: County TB Sanitorium, 400 Hay St., Restacked 4-27-66

MACOUPIN

Carlinville—55397

Business Building, 35½ Daley St., Ref: Prairie Farm Dairies Store, Rt. 4, Generator: High School

MADISON

Alton-55089

County Civil Defense Bldg., 513 E. Third St.

Edwardsville—55398

LeClair Grade School, New Franklin Rd., Ref: LeClair Grade School, Frozen Food Locker Plant

Marion

Centralia-55117

Chapel Bldg., Elmwood Cemetery, Ref: Frozen Food Locker Plant, 324 E. Broadway

Mason

Havana—56005

C & I R.R. Depot, Rt. 136, Heated: High School, Ref: Morgan's Market, 305 E. Main St. MASSAC

Metropolis—55453

Power & Light Building, 101 Front St., Ref: Cummings Spec. Locker; 1210 E. Fifth St.

Monroe

Waterloo-55338

County Nursing Home

Morgan

Jacksonville—55084

Jacksonville State Hospital, Basement, Veterans Diag. Bldg. Ref: 2nd Floor, Stores Bldg.

Jacksonville—55088

Jacksonville State Hospital, Basement, Veterans Diag. Bldg., Ref: 2nd Floor, Stores Bldg. PEORIA

Bartonville-62407

Civil Defense Center, Abbott Center, Peoria

State Hospital

Peoria-62413

Carson, Pirie, Scott & Co., Central Distribution

801 S. W. Washington

PERRY

DuQuoin-55454

Heat Plant & Ref: Marshall Browning Hospital, 900 N. Washington, General: Ill. Central Depot,

Oak St. RICHLAND

Olney-55412

County Court House, Main St.

Muddy---55090

Old Grade School

SCHUYLER

Rushville-57323

Scripps Park Country Club, Ref: Culbertson Hospital and Barllow Packing Co.

TAZEWELL

Pekin--62415

Pekin High School, East Campus, Ref: Memorial Hospital

Anna-55092

Anna State Hospital, Bldg. #4 and Hamilton

Hall

VERMILLION

Danville-55349

St. Elizabeth's Hospital, 600 Sager Ave.

Danville-55350

St. Elizabeth's Hospital, 600 Sager Ave.

WABASH

Mt. Carmel—62404

City Bldg., 3rd and Market Sts., Ref: Wabash

General Hospital

WHITESIDE

Erie-57304

Erie High School (Basement), Ref: Erie Locker

Plant, Main St.

APPROVED LABORATORIES—PKU—FLUOROMETRIC TEST*

ALTON

Alton Memorial Hospital Laboratory

AURORA

Clinical Laboratory, Aurora Medical Park, 143

S. Lincoln Ave.

CHAMPAIGN

Burnham City Hospital Laboratory

CHICAGO

Children's Memorial Hospital Laboratory

Columbus Hospital Laboratory

Michael Reese Hospital

Mt. Sinai Hospital Laboratory

Presbyterian-St. Luke's Hospital

State Laboratory, 1800 W. Fillmore St.

ELGIN

Sherman Hospital Laboratory

EVANSTON

St. Francis Hospital Laboratory

Sterling—62405

City Hall, 212 Third Ave., Ref: Community

General Hospital

WILL.

Joliet-54005

Barrett's Hardware, Bldg. #4, 342 Henderson

St., Heated: Bldg. next to Bldg. #4, Ref:

Silver Cross Hospital

WINNEBAGO

Rockford-62403

Whitehead School, 2325 Ohio Pkwy., Ref:

Thomas Jefferson High School

PDH Training Units In Illinois

CHAMPAIGN

Rantoul-61866

City Civil Defense

DuPage.

Elmhurst-53034

York Community High School

JACKSON

Carbondale—53031

Southern Illinois University

Salem-56006

Salem CD Headquarters, Bryan Park

PEORIA

Peoria-53036

Peoria State Hospital

ST. CLAIR

Belleville-53030

1505 Caseyville Avenue, P.O. Box 271

SANGAMON

Springfield—53037

Douglas Grade School, 444 W. Reynolds St.

VERMILION

Danville-53032

St. Elizabeth's Hospital, 600 Sager Ave.

Rockford-53038

Presidential Court, Loves Park

FREEPORT

Freeport Memorial Hospital Laboratory

NAPERVILLE

Edward Hospital Laboratory

OAK LAWN

Christ Community Hospital

OAK PARK

Oak Park Hospital Laboratory

PEORIA

St. Francis Hospital Clinical Laboratory

ROCKFORD

Swedish-American Hospital Laboratory

SKOKIE

Skokie Valley Community Hospital Laboratory

*These laboratories are approved for the use of this procedure for both screening and quantitative determinations.

POISON CONTROL CENTERS IN ILLINOIS

AURORA

Copley Memorial Hospital Lincoln & Weston Avenues 896-4611, Ext. 725

St. Charles Hospital 400 New York Street 897-8714, Ext. 50

BELLEVILLE

Memorial Hospital 4501 North Park Dr. 233-7750, Ext. 58

BERWYN

MacNeal Memorial Hospital 3249 S. Oak Park Ave. 484-2211

BLOOMINGTON

Mennonite Hospital 807 North Main St. 823-8241, Ext. 311 St. Joseph's Hospital 824 West Jackson St. 829-9481

CAIRO

St. Mary's Hospital 2020 Cedar St. 2400, Ext. 35-45

CANTON

Graham Hospital Association 210 W. Walnut St. 647-5240, Ext. 48

CARBONDALE

Doctors Hospital 404 W. Main St. 457-4101, Ext. 42

CHAMPAIGN

Burnham City Hospital 311 E. Stoughton St. 359-1651, Ext. 232

CHANUTE AIR FORCE BASE* United States Air Force Hospital 893-3111, Ext. 6234

CHESTER

Memorial Hospital 1900 State St. 826-2367, Ext. 41-44

CHICAGO

Bob Roberts Memorial Hospital 920 East 59th St. 684-6100, Ext. 6231 Night Ext. 5412-6231 Children's Memorial Hospital 2300 Children's Plaza 348-4040, Ext. 338-9

Cook County Hospital 1825 West Harrison St. 738-2500, Ext. 2153

*Limited for treatment of military personnel and families, except for indicated emergencies.

Illinois Research Hospital 840 South Wood St. 663-7297

Mercy Hospital

2537 South Prairie Ave. 842-4700, Ext. 371-2

Michael Reese Hospital

29th Street & Ellis Ave. 225-5533, Ext. 761 Night Ext. 261

Mt. Sinai Hospital

15th & California

277-4000, Ext. 297-8

Municipal Contagious Disease 3026 South California Ave. 247-5700

Resurrection Hospital 7435 West Talcott Ave. 774-8000, Ext. 235

DANVILLE

Lake View Memorial Hospital 812 N. Logan Ave. 446-7200, Ext. 765-789 St. Elizabeth's Hospital 600 Sager St. 442-6300

DECATUR

Decatur-Macon County Hospital 2300 N. Edward St. 877-8121, Ext. 676 St. Mary's Hospital 1800 E. Lake Shore Dr. 429-2966, Ext. 640-739

DES PLAINES

Holy Family Hospital 100 North River Road 299-2281, Ext. 856

EAST ST. LOUIS

Christian Welfare Hospital 1509 Illinois Ave. 874-7076 St. Mary's Hospital

St. Mary's Hospital 129 North 8th St. 274-1900

EFFINGHAM

St. Anthony's Hospital 503 North Maple St. 342-2121, Ext. 67

ELGIN

St. Joseph's Hospital 277 Jefferson Ave. 741-5400 Sherman Hospital

934 Center St. 742-9800, Ext. 681-3

ELMHURST

Memorial Hospital of DuPage County 315 Schiller St. 833-1400, Ext. 551-2

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EVANSTON	Silver Cross Hospital
Community Hospital	600 Walnut St.
2040 Brown Ave.	727-1711, Ext. 731, 757
869-5400, Ext. 54-58	KANKAKEE
Evanston Hospital	St. Mary's Hospital
2650 Ridge Ave.	150 South Fifth St.
492-6460 St. Eropsis Haspital	939-2531, Ext. 634, 734, 735-6
St. Francis Hospital	KEWANEE
355 Ridge Ave. 492-2440	Kewanee Public Hospital
EVERGREEN PARK	719 Elliott St.
Little Company of Mary	3361
2800 W. 95th St.	LAKE FOREST
422-6200, Ext. 1211	Lake Forest Hospital
FAIRBURY	660 North Westmoreland Road
Fairbury Hospital	234-5600
519 South Fifth St.	LASALLE
692-2346, Ext. 256, 230, 221	St. Mary's Hospital
FREEPORT	1015 O'Conor Ave.
Freeport Memorial Hospital	223-0607, Ext. 84, 46
420 South Harlem Ave.	LIBERTYVILLE
232-5141	Condell Memorial Hospital
GALENA	Cleveland & Stewart Aves.
Northwestern Illinois Community Hospital	362-2900, Ext. 325
Summit Street	LINCOLN
777-1340	Abraham Lincoln Memorial Hospital
GALESBURG	315 Eighth St.
Galesburg Cottage Hospital	732-2161, Ext. 346
674 North Seminary St.	MACOMB
343-4121, Ext. 356	McDonough District Hospital
St. Mary's Hospital	525 East Grant St.
239 South Cherry St.	833-4101
343-3161	MATTOON
GRANITE CITY	Mem. Dist. Hosp. of Coles County
St. Elizabeth's Hospital	2101 Champaign Ave.
2100 Madison Ave.	234-8881, Ext. 29
876-2020, Ext. 224-257	McHENRY
HARVEY	McHenry Hospital
Ingalls Memorial Hospital	3516 West Waukegan Road
15510 Page Ave.	385-2200, Ext. 614
333-2300, Ext. 789, 787	MELROSE PARK
HIGHLAND PARK	Westlake Hospital
Highland Park Hospital Foundation	1225 Superior St.
718 Glenview Ave.	681-3000, Ext. 239
432-8000, Ext. 561	MENDOTA
HINSDALE	Mendota Community Hospital
Hinsdale San. & Hospital	Memorial Drive & Route 51
120 North Oak St.	2131
323-2100, Ext. 336-8	MOLINE
HOOPESTON	Moline Public Hospital
Hoopeston Community Memorial Hospital 701 E. Orange	635-10th Ave.
1700	762-3651, Ext. 214, 228
JACKSONVILLE	MONMOUTH
	Monmouth Hospital
Passavant Memorial Area Hospital 1500 West Walnut	515 East Euclid Ave.
245-9541, Ext. 222-3	734-3141, Ext. 350
JOLIET	MOUNT CARMEL
St. Joseph's Hospital	Wabash General Hospital
333 N. Madison St.	1418 Maysville Road
725-7133, Ext. 679-80	262-4121, Ext. 234
123 1133, EAC 017 00	LUL TILI, LAL. LJT

MOUNT VERNON

Good Samaritan Hospital 605 North Twelfth St. 242-4600, Ext. 303

NAPERVILLE

Edward Hospital South Washington St. 355-0450

NORMAL

Brokaw Hospital
Virginia at Franklin Ave.
829-7685

OAK LAWN

Christ Community Hospital 4440 West 95th St. 423-7000, Ext. 660

OAK PARK

West Suburban Hospital 518 North Austin Blvd. 383-6200, Ext. 605

OLNEY

Richland Memorial Hospital 800 East Locust St. 395-2131

OTTAWA

Ryburn Memorial Hospital 701 Clinton St. 433-3100

PARK RIDGE

Lutheran General Hospital 1775 Dempster St. 692-2210

PEKIN

Pekin Memorial Hospital Corner of 14th & Court St. 347-1151, Ext. 241

PEORIA

Methodist Hospital
221 Northeast Glen Oak Ave.
685-6511, Ext. 250, 360

Proctor Community Hospital
5409 North Knoxville Ave.
688-6621, Ext. 791

St. Francis Hospital

530 Northeast Glen Oak Ave. 674-7731, Ext. 514

PERU

Peoples Hospital 925 West Street 223-3300

PITTSFIELD

Illini Community Hospital 620 West Washington St. 285-2113, Ext. 238

QUINCY

Blessing Hospital 1005 Broadway 222-3274, Ext. 211 St. Mary's Hospital 1415 Vermont St. 223-1200

ROCKFORD

Rockford Memorial Hospital 2400 North Rockton Ave. 968-6861, Ext. 548 St. Anthony's Hospital 6666 E. State St. 398-7600 Swedish-American Hospital 1316 Charles St. 968-6898, Ext. 623, 633, 602

ROCK ISLAND

St. Anthony's Hospital 767 - 30th St. 788-7631, Ext. 771

ST. CHARLES

Delnor Hospital 975 North Fifth Ave. 584-3300, Ext. 223

SPRINGFIELD

Memorial Hospital First and Miller Sts. 552-3361, Ext. 333-4 St. John's Hospital 701 E. Mason St. 544-6451, Ext. 375

URBANA

Carle Hospital
602 West University Ave.
337-3100, 337-3311
Mercy Hospital
1412 West Park Ave.
337-2131

WAUKEGAN

St. Therese Hospital
West Washington St.
662-5800, Ext. 786-7
Victory Memorial Hospital
1324 North Sheridan Road
688-3000, Ext. 650
688-4181

WOODSTOCK

Memorial Hospital for McHenry County 527 West South St. 338-2500, Ext. 32

ZION

Zion-Benton Hospital, Inc. 2500 Emmaus Ave. 872-4561

HOSPITALS

The Illinois Department of Public Health is responsible for implementing the Hospital Licensing Act, excerpts from which follow:

Section 2. The purpose of this Act is to provide for the better protection of the public health through the development, establishment, and enforcement of standards (1) for the care of individuals in hospitals, (2) for the construction, maintenance, and operation of hospitals which, in light of advancing knowledge, will promote safe and adequate treatment of such individuals in hospitals, and (3) that will have regard to the necessity of determining that a person establishing a hospital have the qualifications, background, character and financial resources to adequately provide a proper standard of hospital service for the community.

Hospital Licensing Requirements

To implement the Hospital Licensing Act, the Department of Public Health has pertinent requirements. The following cover the medical staff.

- 1. The medical staff shall be composed only of physicians and dentists licensed by the Illinois Department of Registration and Education in accordance, respectively, with provisions of the Medical Practice Act and Dental Practice Act.
- 2. The medical staff shall be organized in accordance with written bylaws, rules and regulations, approved by the governing board. The bylaws, rules and regulations shall specifically provide:
 - a. for eligibility for staff membership;
 - b. for such divisions and departments as are warranted, (as a minimum, Active and Consulting divisions are required)
 - c. for such officers and/or committees as are warranted; however, committees shall be

- designated to be responsible for medical records and for pharmacy and therapeutics;
- d. for determination of qualifications and privileges;
- e. that medical staff meetings be held regularly, and that written minutes of all meetings be kept;
- f. for review and analysis of the clinical experience of the hospital at regular intervals
 —the medical records of patients to be the basis for such review and analysis;
- g. that tissue removed at operation shall be examined by a qualified pathologist and that the findings shall be made a part of the patient's medical record;
- h. for consultation between medical staff members in complicated cases; and
- i. for keeping complete medical records.

Section B. Supervision of Patient Care

All persons admitted to the hospital shall be under the professional care of a member of the medical staff.

Section C. Orders for Medication and Treatment

No medication or treatment shall be given to a patient except on the written order of a member of the medical staff.

Section D. Tissue Examination

All tissue removed at operation shall be examined by a qualified pathologist and the findings shall be made a part of the patient's hospital medical record. A tissue committee of the medical staff is highly recommended.

Section E. Availability for Emergencies

The governing board shall provide that one or more physicians shall be available at all times for emergencies.

GENERAL HOSPITALS

(For Identification—see footnote, page 512)

ALEDO (Mercer)

Mercer County Hospital (E-63)

ALTON (Madison)

**Alton Memorial Hospital (B-210)

*St. Anthony's Hospital (B-140)

**St. Joseph's Hospital (B-152)

AMBOY (Lee)

Amboy Public Hospital (B-15)

ANNA (Union)

Union County Hospital District (F-67)

ARLINGTON HEIGHTS (Cook)

**Northwest Community Hospital (B-223)

AURORA (Kane)

**Copley Memorial Hospital (B-200)

*St. Charles Hospital (B-107)

*St. Joseph Mercy Hospital (B-107)

AVON (Fulton)

Saunders Hospital (B-24)

BEARDSTOWN (Cass)

*Schmitt Memorial Hospital (D-50)

BELLEVILLE (St. Clair)

**Memorial Hospital (B-151)

†*St. Elizabeth's Hospital (B-294)

†*Scott, U. S. Air Force Hospital (J-300)

BELVIDERE (Boone)

*Highland Hospital, Inc. (B-65)

*St. Joseph's Hospital (B-100)

BENTON (Franklin)

*The Franklin Hospital (F-125)

BERWYN (Cook)

**MacNeal Memorial Hospital (B-423)

BLOOMINGTON (McLean)

*Mennonite Hospital (B-130)

*St. Joseph's Hospital (B-158)

BLUE ISLAND (Cook)

**St. Francis Hospital (B-220)

BREESE (Clinton)

*St. Joseph's Hospital (B-42)

CAIRO (Alexander)

*St. Mary's Hospital (B-130)

CANTON (Fulton) *Graham Hospital Association (B-152) CARBONDALE (Jackson) *Doctors Hospital (B-60) *Holden Hospital (B-57) CARLINVILLE (Macoupin) *Carlinville Area Hospital (B-68) CARMI (White) *Carmi Township Hospital (H-63) CARROLLTON (Greene) Thomas H. Boyd Memorial Hospital (B-43) CARTHAGE (Hancock) *Memorial Hospital (B-80) CENTRALIA (Marion) **St. Mary's Hospital (B-117) CHAMPAIGN (Champaign) **Burnham City Hospital (D-161) *Cole Hospital (C-61) CHARLESTON (Coles) *Charleston Community Memorial Hospital, Inc. (B-65) CHESTER (Randolph) *Memorial Hospital (F-52) CHICAGO (Cook) *Alexian Brothers Hospital (B-240) *American Hospital of Chicago (B-168) **Augustana Hospital (B-350) **Belmont Community Hospital (B-157) *Bethany Brethren Hospital (B-59) *Bethany Methodist Hospital (B-192) *Bethesda Hospital (B-115) *Central Community Hospital (B-93) *Cermak Memorial Hospital (D-129) **Chicago Osteopathic Hospital (B-171) †*Chicago Wesley Memorial Hospital (B-655) **Columbus Hospital (B-407) *Cook County Hospital (E-2,747) *Edgewater Hospital (B-334) **Englewood Hospital (B-169) *Evangelical Hospital of Chicago (B-174) *Forkosh Memorial Hospital (B-150) **Frank Cuneo Hospital (B-178) *Franklin Boulevard Community Hospital (B-110)**Garfield Park Community Hospital (B-141) †**Grant Hospital of Chicago (B-339) *Henrotin Hospital (B-95) **Holy Cross Hospital (B-361) *Hospital of St. Anthony de Padua (B-209) Ida Mae Scott Hospital (C-15) *Illinois Central Hospital (B-311) †**Illinois Masonic Hospital (B-544) *Jackson Park Hospital (B-184) †**Loretto Hospital (B-163) **Louis A. Weiss Memorial Hospital (B-250)

*Northwest Hospital, Inc. (C-225) **Norwegian-American Hospital, Inc. (B-222) †**Passavant Memorial Hospital (B-351) †**Presbyterian-St. Luke's Hospital (B-839) *Provident Hospital and Training School (B-204)**Ravenswood Hospital Association (B-275) **Resurrection Hospital (B-260) *Roosevelt Memorial Hospital (B-125) *Roseland Community Hospital (B-131) **St. Anne's Hospital (B-405) *St. Bernard's Hospital (B-197) *St. Elizabeth's Hospital (B-319) **St. Frances Xavier Cabrini Hospital (B-210) *St. George Hospital (B-128) †**St. Joseph Hospital (B-489) **St. Mary of Nazareth Hospital (B-280) *Sheridan General Hospital †(on Clark) (B-86) (on the Lake) (B-137) **South Chicago Community Hospital (B-300) **South Shore Hospital (B-189) **Swedish Covenant Hospital (B-240) †**University of Chicago Hospitals and Clinics (B-661)†*University of Illinois Research and Educational Hospitals (I-605) †*Veterans Administration Research Hospital (J-505)†*Veterans Administration West Side Hospital (J-525)*The von Solbrig Memorial Hospital, Inc. (A-102)*Walther Memorial Hospital (B-222) *Woodlawn Hospital (B-145) CHICAGO HEIGHTS (Cook) **St. James Hospital (B-420) CHRISTOPHER (Franklin) *The Miners Hospital (B-34) CLIFTON (Iroquois) Central Hospital (B-40) CLINTON (DeWitt) *John Warner Hospital (D-45) DANVILLE (Vermilion) **Lake View Memorial Hospital (B-237) **St. Elizabeth Hospital (B-180) DECATUR (Macon) **Decatur and Macon County Hospital (B-361) *St. Mary's Hospital (B-389) *The Wabash Memorial Hospital (B-61) DEKALB (DeKalb) *DeKalb Public Hospital (D-110) DES PLAINES (Cook) **Holy Family Hospital (B-236) DIXON (Lee) *Dixon Public Hospital (B-120) DU QUOIN (Perry) *Marshall Browning Hospital (B-66) EAST ST. LOUIS (St. Clair) *Centreville Township Hospital (H-145) *Christian Welfare Hospital (B-194)

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*Louise Burg Hospital (B-100)

†**Mercy Hospital (B-355)

*Lutheran Deaconess Hospital (B-183)

†**Michael Reese Hospital and Medical Center

†**Mount Sinai Hospital of Chicago (B-388)

*Martha Washington Hospital (B-58)

**Mary Thompson Hospital (B-112)

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*St. Mary's Hospital (B-300)

EFFINGHAM (Effingham) HIGHLAND PARK (Lake) **The Highland Park Hospital Foundation *St. Anthony Memorial Hospital (B-126) (B-196) ELDORADO (Saline) Ferrell Hospital (C-48) HILLSBORO (Montgomery) *Hillsboro Hospital (B-65) Pearce Hospital Foundation (B-33) HINES (Cook) ELGIN (Kane) †*Veterans Administration Hospital (J-2,079) **St. Joseph Hospital (B-154) HINSDALE (DuPage) **Sherman Hospital Association (B-335) ELK GROVE VILLAGE (Cook) †*Hinsdale Sanitarium and Hospital (B-353) HOOPESTON (Vermilion) *St. Alexius Hospital (B-225) *Hoopestown Community Memorial Hospital ELMHURST (DuPage) **Memorial Hospital of DuPage County (B-413) (B-44)HOPEDALE (Tazewell) EUREKA (Woodford) *Hopedale Hospital (B-44) *Eureka Hospital (C-31) JACKSONVILLE (Morgan) EVANSTON (Cook) *Holy Cross Hospital (B-122) *Community Hospital of Evanston (B-54) *Passavant Memorial Area Hospital (B-150) †**Evanston Hospital Association (B-467) JERSEYVILLE (Jersey) *Northwestern University Student Health *Jersey Community Hospital (F-54) Service Hospital (B-44) **St. Francis Hospital (B-343) JOLIET (Will) †**St. Joseph Hospital (B-429) EVERGREEN PARK (Cook) *Silver Cross Hospital (B-271) †**Little Company of Mary Hospital (B-559) KANKAKEE (Kankakee) FAIRBURY (Livingston) *Riverside Hospital (B-136) *Fairbury Hospital (B-86) FAIRFIELD (Wayne) *St. Mary's Hospital (B-262) *Fairfield Memorial Hospital (B-104) KEWANEE (Henry) *Kewanee Public Hospital (B-75) FLORA (Clay) *Clay County Hospital (E-52) *St. Francis Hospital (B-87) FREEPORT (Stephenson) LA GRANGE (Cook) *Freeport Memorial Hospital (B-186) **Community Memorial General Hospital GALENA (Jo Daviess) (B-223)*Northwestern Illinois Community Hospital LA HARPE (Hancock) (F-31)LaHarpe Hospital (B-24) GALESBURG (Knox) LAKE FOREST (Lake) **Galesburg Cottage Hospital (B-191) **Lake Forest Hospital (B-101) *St. Mary's Hospital (B-134) LA SALLE (LaSalle) GENESEO (Henry) *St. Mary's Hospital (B-123) *Hammond-Henry District Hospital (F-66) LAWRENCEVILLE (Lawrence) GENEVA (Kane) *Lawrence County Memorial Hospital (E-78) **Community Hospital (B-116) LIBERTYVILLE (Lake) GIBSON CITY (Ford) **Condell Memorial Hospital (B-91) *Gibson Community Hospital (B-45) LINCOLN (Logan) GRANITE CITY (Madison) *Abraham Lincoln Memorial Hospital (B-154) **St. Elizabeth Hospital (B-248) LITCHFIELD (Montgomery) GREAT LAKES (Lake) St. Francis Hospital (B-134) †*U. S. Naval Hospital (J-1,117) MACOMB (McDonough) GREENEVILLE (Bond) *McDonough District Hospital (F-104) *Edward A. Utlaut Memorial Hospital (B-72) MANTENO (Kankakee) HARRISBURG (Saline) Hillman Memorial Hospital (C-26) Doctors Hospital of Harrisburg, Inc. (C-80) MARION (Williamson) HARVARD (McHenry) *Marion Memorial Hospital (D-75) *Harvard Community Memorial Hospital (F-40) *Veterans Administration Hospital (J-184) HARVEY (Cook) MATTOON (Coles) *Ingalls Memorial Hospital (B-309) **Memorial District Hospital of Coles County HAVANA (Mason) (F-99)*Mason District Hospital (F-48) McHENRY (McHenry) HAZEL CREST (Cook) **McHenry Hospital (B-43) *South Suburban Hospital Foundation (B-57) McLEANSBORO (Hamilton) HERRIN (Williamson) *Hamilton Memorial Hospital (F-32) *Herrin Hospital (B-131) MELROSE PARK (Cook)

**Gottlieb Memorial Hospital (B-202)

**Westlake Community Hospital (B-141)

HIGHLAND (Madison)

*St. Joseph's Hospital (B-133)

MENDOTA (La Salle) PONTIAC (Livingston) *Mendota Community Hospital (B-58) *St. James Hospital (B-65) METROPOLIS (Massac) PRINCETON (Bureau) *Massac Memorial Hospital (F-57) *Perry Memorial Hospital (D-98) MOLINE (Rock Island) QUINCY (Adams) **Lutheran Hospital (B-270) **Blessing Hospital (B-237) †**St. Mary's Hospital (B-246) *Moline Public Hospital (D-240) MONMOUTH (Warren) RANTOUL (Champaign) *Chanute, U. S. Air Force Hospital (J-175) *Monmouth Hospital (D-81) MONTICELLO (Piatt) RED BUD (Randolph) *The John and Mary E. Kirby Hospital (B-35) *St. Clement's Hospital (B-84) MORRIS (Grundy) ROBINSON (Crawford) *Morris Hospital (B-51) *Crawford Memorial Hospital (F-64) MORRISON (Whiteside) ROCHELLE (Ogle) *Morrison Community Hospital (F-32) *Rochelle Community Hospital (B-38) MOUNT CARMEL (Wabash) ROCKFORD (Winnebago) *Wabash General Hospital District (F-71) *Rockford Memorial Hospital (B-264) MOUNT VERNON (Jefferson) *St. Anthony Hospital (B-252) **Good Samaritan Hospital (B-110) †*Swedish-American Hospital (B-321) Jefferson County Memorial Hospital (B-50) ROCK ISLAND (Rock Island) MURPHYSBORO (Jackson) †**St. Anthony's Hospital (B-240) ROSICLARE (Hardin) *St. Joseph Memorial Hospital (B-64) NAPERVILLE (DuPage) *Hardin County General Hospital (B-27) *Edward Hospital (F-110) RUSHVILLE (Schuyler) NASHVILLE (Washington) *Sarah D. Culbertson Memorial Hospital (F-56) ST. CHARLES (Kane) *Washington County Hospital (F-36) NORMAL (McLean) **Delnor Hospital (B-105) *Brokaw Hospital (B-142) SALEM (Marion) NORTHLAKE (Cook) *Salcm Memorial Hospital (B-39) Northlake Community Hospital (B-105) SANDWICH (DeKalb) OAK LAWN (Cook) *Sandwich Community Hospital (B-63) **Christ Community Hospital (B-348) SAVANNA (Carroll) Savanna City Hospital (D-44) OAK PARK (Cook) *Oak Park Hospital (B-246) SHELBYVILLE (Shelby) **West Suburban Hospital (B-389) *Shelby County Memorial Hospital (B-79) OLNEY (Richland) SKOKIE (Cook) **Richland Memorial Hospital (E-150) *Skokie Valley Community Hospital (B-153) OREGON (Ogle) SPARTA (Randolph) *Warmolts Clinic (C-25) *Sparta Community Hospital (F-30) OTTAWA (LaSalle) SPRINGFIELD (Sangamon) **Ryburn Memorial Hospital (D-117) †*Memorial Hospital (B-402) †**St. John's Hospital (B-723) PANA (Christian) *Huber Memorial Hospital (B-89) SPRING VALLEY (Bureau) PARIS (Edgar) *St. Margaret's Hospital (B-141) *Hospital & Medical Foundation of Paris, Inc. STAUNTON (Macoupin) *Community Memorial Hospital (B-62) (B-66)PARK RIDGE (Cook) STERLING (Whiteside) **Community General Hospital (D-144) †*Lutheran General Hospital (B-326) PAXTON (Ford) STREATOR (La Salle) *Paxton Community Hospital (B-39) **St. Mary's Hospital (B-233) PEKIN (Tazewell) SYCAMORE (DeKalb) *Pekin Memorial Hospital (B-181) *Sycamore Municipal Hospital (D-70) PEORIA (Peoria) TAYLORVILLE (Christian) †*The Methodist Hospital of Central Illinois **St. Vincent Memorial Hospital (B-155) (B-496)TUSCOLA (Douglas) *Proctor Community Hospital (B-210) *Douglas County Jarman Memorial Hospital †**St. Francis Hospital (B-623) (E-42)PERU (LaSalle) URBANA (Champaign) *Peoples Hospital (B-100) **Carle Foundation Hospital (B-154) PINCKNEYVILLE (Perry) *McKinley Memorial Hospital (I-62) *Pinckneyville Community Hospital (F-52) †*Mercy Hospital (B-250)

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VANDALIA (Favette)

*Fayette County Hospital (F-95)

PITTSFIELD (Pike)

*Illini Community Hospital (B-100)

WATSEKA (Iroquois)

*Iroquois Hospital (B-72)

WAUKEGAN (Lake)

*Lake County General Hospital (E-65)

*St. Therese Hospital (B-280)

*Victory Memorial Hospital (B-352)

WEST FRANKFORT (Franklin)

UMWA Union Hospital (B-45)

WHITE HALL (Greene)

White Hall Hospital, Inc. (B-18)

WINFIELD (DuPage)

**Central DuPage Hospital (B-113)

WOOD RIVER (Madison)

*Wood River Township Hospital (H-73)

WOODSTOCK (McHenry)

*Memorial Hospital for McHenry County

(B-100)

ZION (Lake)

*Zion-Benton Hospital (B-107)

HOSPITALS WITH SPECIAL TYPE OF SERVICE

1100111712	5	Type of
		Service
AURORA (Kane)	Kane County Springbrook Sanitarium (E-57)	ТВ
CAIRO (Alexander)	Alexander County Tuberculosis Hospital (E-36)	ТВ
CASEYVILLE (St. Clair)	Pleasant View Sanatorium (E-100)	TB
CHICAGO (Cook)	*Booth Memorial Hospital (B-25) *Charles H. and Rachel M. Schwab Rehabilitation Hospital (B-61)	Maternity Rehabilitation
	*Chicago Eye, Ear, Nose and Throat Hospital (C-37)	EENT
	*Chicago State Tuberculosis Sanitarium (I-336)	ТВ
	*The Children's Memorial Hospital (B-237)	Pediatric
	Halco Sanitarium, Inc. (C-10)	Alcoholic
	Illinois Children's Hospital-School (I-96)	Rehabilitation, Pediatric
	*Illinois Eye and Ear Infirmary (I-124)	EENT
	Illinois Visually Handicapped Institute (I-52)	Rehabilitation
	*LaRabida Jackson Park	Pediatric,
	Sanitarium (B-104)	Chronic
	*Martha Washington Hospital (B-50)	Alcoholic
	*Municipal Contagious Disease Hospital (D-100)	Contagious Disease
	*Municipal Tuberculosis Sanitarium (D-1,081)	TB
	*Rehabilitation Institute of Chicago (B-65)	Rehabilitation
	St. Vincent's Infant Hospital (B-65)	Pediatric
	*Shriners Hospital for Crippled	Orthopedic,
DANIE CO.	Children (B-68)	Pediatric
DANVILLE (Vermilion)	Vermilion County Tuberculosis Dispensary and Hospital (E-34)	ТВ
DECATUR (Macon)	Macon County Tuberculosis Sanatorium (E-75)	Nursing Home, TB
EDWARDSVILLE (Madison)	Madison County TB Sanatorium (E-87)	TB
HINSDALE (Cook)	*The Suburban Cook County Tuberculosis	
	Sanitarium District (G-206)	TB
JACKSONVILLE (Morgan)	Oaklawn, Morgan County Tuberculosis Sanatorium (E-40)	ТВ
JOLIET (Will)	Sunny Hill Sanatorium (E-60)	ТВ
MACKINAW (Tazewell)	Oak Knoll Sanatorium (E-40)	ТВ
MOOSEHEART (Kane)	Mooseheart Hospital (B-43)	Pediatric
MOUNT VERNON (Jefferson)	*Mount Vernon State	ТВ
	Tuberculosis Sanitarium (I-125)	

Hospitals with Special Type of Service (Continued)

OAK FOREST (Cook)	Oak Forest Hospital (E-2,463)	Chronic, Rehabilitation
OTTAWA (LaSalle)	Highland Sanatorium and Convalescent Home of LaSalle County (E-82)	TB, Nursing Home
	*Ottawa General Hospital (C-42)	Chronic
PEORIA (Peoria)	*Peoria Municipal Tuberculosis Sanitarium (D-79)	ТВ
PONTIAC (Livingston)	Livingston County Sanatorium (E-46)	TB
QUINCY (Adams)	Hillcrest, Adams County Tuberculosis Sanatorium (E-38)	TB,
ROCKFORD (Winnebago)	Rockford Municipal Tuberculosis Sanitarium (D-100)	TB Nursing Home
ROCK ISLAND (Rock Island)	*Rock Island County Tuberculosis Sanatorium (E-71)	ТВ
SPRINGFIELD (Sangamon)	*St. John's Sanatorium (B-125)	ТВ
URBANA (Champaign)	Outlook Champaign County Tuberculosis Sanatorium (E-25)	ТВ
	University of Illinois Rehabilitation Center (I)	Rehabilitation
WAUKEGAN (Lake)	*Lake County Tuberculosis Sanatorium (E-90)	ТВ
WEDRON (LaSalle)	St. Joseph's Health Resort and Sanitarium (B-94)	Medical- Chronic

STATE MENTAL HOSPITALS

ALTON (Madison) GALESBURG (Knox) Alton State Hospital (1,371) *Galesburg State Research Hospital (1,843) ANNA (Union) JACKSONVILLE (Morgan) Anna State Hospital (1,838) *Jacksonville State Hospital (2,002) CHICAGO (Cook) KANKAKEE (Kankakee) Chicago State Hospital (2,814) *Kankakee State Hospital (2,493) *Illinois State Psychiatric Institute (360) MANTENO (Kankakee) DANVILLE (Vermilion) Manteno State Hospital (5,841) *Veterans Administration Hospital (J-1,680) MENARD (Randolph) DOWNEY (Lake) Illinois Security Hospital (400) *Veterans Administration Hospital (J-2,487) PEORIA (Peoria) EAST MOLINE (Rock Island) *Peoria State Hospital (1,660) *East Moline State Hospital (1,343) ELGIN (Kane) TINLEY PARK (Cook) Elgin State Hospital (3,910) Tinley Park State Hospital (480)

PRIVATE MENTAL HOSPITALS

AURORA (Kane)

*Mercyville Hospital (B-160)

CHICAGO (Cook)

*Fairview Hospital (C-100)

*Nicholas J. Pritzker Center (B-40)

*Pinel Hospital (B-70)

*Ridgeway Hospital (B-92)

DES PLAINES (Cook)

Forest Hospital (C-100)

*Resthaven Hospital (C-100)

FOREST PARK (Cook)

*Riveredge (C-160)

WINNETKA (Cook)

*North Shore Hospital (C-100)

STATE SCHOOLS FOR MENTALLY DEFECTIVE

CENTRALIA (Marion)
Warren G. Murray Children's Center (558)
CHICAGO (Cook)
*Illinois State Pediatric Institute (264)
DIXON (Lee)
Dixon State School (3,336)

DWIGHT (Livingston)
William W. Fox Children's Center (250)
HARRISBURG (Saline)
A. L. Bowen Children's Center (240)
LINCOLN (Logan)
Lincoln State School (3,828)

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Identification of Hospitals

The hospitals marked with an asterisk () are those which are accredited by the Joint Commission on Accreditation of Hospitals as of Jan. 1, 1967.

The presence of a hospital on this list means it has complied in the main with the standards of the Joint Commission on Accreditation of Hospitals as compiled over the years by the medical and hospital professions. The standards are minimal and it is hoped hospitals will make every effort to exceed them.

Hospitals with less than 25 beds are not eligible for accreditation.

Accredited hospitals with a functioning utilization review plan are eligible providers of service under Medicare. Hospitals ineligible for accreditation or unable to meet JCAH requirements have been especially surveyed by the Illinois Department of Public Health and virtually all have been certified as eligible providers of service under Medicare.

Inquiries about this listing or hospital accreditation should be directed to the office of the Joint Commission on Accrediation of Hospitals at 645 N. Michigan Ave., Chicago 60611.

**Approved to admit selected gynecological patients to maternity departments.

†Dagger indicates general hospitals having psychiatric units licensed by the Illinois Department of Public Health. All other mental facilities are licensed and/or operated by this department (federal hospitals excluded).

Number in parenthesis indicates number of beds in hospital. Initial preceding number refers to the type of control, as follows:

A — Corporation

B — Non-profit association or corporation

C — Privately owned and operated

D — City

E — County

F - Hospital District

G - Sanitarium District

H — Township

I - State

J - Federal

DIRECTORY OF LICENSED HOMES

The following list of homes licensed by the Illinois Department of Public Health (as of August, 1967) is divided into three sections: nursing homes, sheltered care homes, and homes for the aged. Ownership of these homes may be individual, partnership, corporation for profit, non-profit corporation, government, or trust-endowment.

A Nursing Home is equipped and staffed to provide personal and nursing care to all residents.

A Sheltered Care Home is equipped and staffed

to provide only personal services such as assistance with meals, dressing, bathing, etc., but not nursing care.

A Home for the Aged is operated not-forprofit under religious or fraternal auspices or under an endowment. It is operated primarily for persons over 60 years of age and may provide personal care only or nursing and personal care. Some of these homes for the aged provide special services over and above nursing care.

Figure in parentheses indicates number of beds.

NURSING HOMES

ABINGDON (Knox County)
Abingdon Nursing Home (74)
W. Martin St.

ALBION (Edwards County) Rest Haven Manor (49) 120 W. Main St.

ALEDO (Mercer County)
Mercer County Nursing Home (62)
Rt. 4
Oakview Nursing Home (49)
3rd Ave. and 12th St.
Twilight Haven (14)
303 E. Seventh St.

ALHAMBRA (Madison County) Haven of Rest (19) ALTON (Madison County) College Avenue Nursing Home (19) 920 College Ave. Eunice C. Smith Nursing Home (64) 1251 College Ave. Main Street Nursing Home (40) 1216 Main St. Riverview Nursing Home (23) 440 Jefferson St. Villa Terrace Convalescent Home (26) 510 Seminary Sq. Yinger Nursing and Convalescent Center, Inc. (55) 2349 Virden Dr. AMBOY (Lee County) Forman Nursing Home (18)

330 N. Mason Ave.

ANNA (Union County) Herald Nursing Home (24) Union County Skilled Nursing Home (60) 506 Court St. 517 N. Main St. Hillcrest Convalescent Home (24) ARCOLA (Douglas County) 420 Mascoutah Ave. Fishel Nursing Home (26) Memorial Nursing Home (111) 129 N. Pine St. 4315 Memorial Dr. ARLINGTON HEIGHTS (Cook County) Rest Haven Old Folks Home (36) 44th St. and N. Belt West Arlington Heights Rest Home (40) 414 N. Vail St. St. Elizabeth's Home (72) AROMA PARK (Kankakee County) 211 S. Third St. Campbell Nursing Home (32) BELLWOOD (Cook County) Fourth St. Elizabeth Van Gehr Nursing Home (16) 209 S. 22nd Ave. . ARROWSMITH (McLean County) DeArms Nursing Home (15) BELVIDERE (Boone County) W. Crosson St. Maple Crest Nursing Home (48) ARTHUR (Moultrie County) Boone County Home R.R. 1, Rt. 76 The Arthur Home (42) 423 Eberhardt Dr. Sutton's Nursing Home (34) ATLANTA (Logan County) 226 N. State St. Atlanta Nursing Home (16) BEMENT (Piatt County) Chatham St. Bement Rest Haven (27) Bartmann Nursing Home (30) 101 S. Sangamon St. BENTON (Franklin County) R.R. 1 AUBURN (Sangamon County) Franklin Hospital Skilled Nursing Care Unit (82) Parks Memorial Home (54) 201 Bailey Ln. Linwood Nursing Home, Inc. (30) 304 Maple St. AUGUSTA (Hancock County) N. Main and Mitchell Sts. Augusta Nursing Home (18) Rest Haven Nursing Home (28) E. Main St. 418 W. Webster AURORA (Kane County) BERWYN (Cook County) Aurora Borealis Nursing Center (112) Fairfax Geriatric & Convalescent Center (106) 1601 N. Farnsworth Ave. 3601 S. Harlem Ave. Colonial Nursing Home (19) Pershing Convalescent Home (63) 422 N. Lake 3900 S. Oak Park Ave. Elmwood Nursing Home (49) R.N. Convalescent Home (51) 1017 W. Galena Blvd. 6918 Windsor Ave. AVON (Warren) BLANDINSVILLE (McDonough County) Avon Nursing Home, Inc. (48) Newland Nursing Home (42) BARRINGTON (Cook County) Van Buren and Breckenridge Barrington Rest Home, Inc. (50) BLOOMINGDALE (DuPage County) 154 W. Main St. Elaine Boyd Creche (98) BARRY (Pike County) 267 E. Lake St. Barry Nursing Home (28) Mark Lund Hilltop, Inc. (65) 780 Grand St. 158 Prairie St. Churchill Nursing Home (21) BLOOMINGTON (McLean County) 1038 Pratt St. Heritage Manor (99) BATAVIA (Kane County) Walnut at Clinton Blvd. Kane County Home (85) Maple Grove Nursing Home (86) Averill Rd. S. Main Street Rd. BEARDSTOWN (Cass County) Nel-Dor Arms Nursing Home (32) Boyd Nursing Home, Inc. (41) 1116 E. Lafayette St. 209-215 W. Third St. BLUE ISLAND (Cook County) Brierly House Nursing Home, Inc. (34) Bel-Air Nursing Home (28) 604 State St. 2418 W. 127th St. Elmwood Manor (49) Blue Island Nursing Home (35) 13th & Grand Ave. 2427 W. 127th St. Parkview Nursing Home (29) Burr Oaks Nursing and Convalescent Center 903 E. Third St. BEAVERVILLE (Iroquois County) 2426 W. Burr Oaks Ave. Haven of Rest Nursing Home (44) BLUFORD (Jefferson County) BELLEVILLE (St. Clair County) Schumm Nursing Home (38) Atkinson Nursing Home (24) BRADLEY (Kankakee County) 514 S. Jackson St. The Hallmark House (98)

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700 N. Kinsie, Rt. 54

American Manor Convalesvent Home (26) Brookfield Nursing and Convalescent Home 1002 W. Church St. (21)Greenbrier Manor (126) 9128 W. 31st St. Hill Haven Nursing Home (13) 1915 S. Mattis Leonard Nursing Home, Inc. (21) 4548 Deyo BUNKER HILL (Macoupin County) 618 W. Church Oliver Nursing Home (22) Tower View Nursing Home No. 1 (37) 1102 W. Church St. 403 Morgan St. BURNHAM (Cook County) CHARLESTON (Coles County) The Homestead (96) Adkins Nursing Home (29) 14500 Manistee Ave. 849 C St. BUSHNELL (McDonough County) Charleston Nursing Home (24) The Elms (40) 216 Fifth St. McDonough County Home Hillcrest Nursing Home, Inc. (49) Heron Nursing Home (30) 635 Division St. 708 N. Lean St. Hilltop Nursing Home, Inc. (72) CAMP POINT (Adams County) 910 W. Polk St. Grandview Manor, Inc. (49) Oakwood Convalescent Home (28) 205 E. Spring St. 1041 Seventh St. CANTON (Fulton County) Rennels' Nursing Home (15) Canton Nursing Home, Inc. (33) 214 Fifth St. N. Main St. CHERRY VALLEY (Winnebago County) Sherwood Nursing Home (31) Cherry Valley Rest Home (35) 914 S. Main St. Box 123 CARBONDALE (Jackson County) CHESTER (Randolph County) Styrest Nursing Home (104) Three Springs Lodge (63) Rt. 4 on Tower Rd. R.R. 1 CARLINVILLE (Macoupin County) CHICAGO (Cook County) Joiner Nursing Home (35) A-1 Nursing Home, Inc. (43) 706 N. Oak St. 4247 N. Hazel Lake View Nursing Home (74) A-1 Nursing Home, Inc. (8) R.R.3 4249 N. Hazel Lee Nursing Home (10) Addison Manor, Inc. (40) 334 Orient St. 3526 N. Reta Ave. Macoupin County Nursing Home (98) Albany Park Kosher Nursing Home, Inc. (30) R.R. 2 3418 W. Ainslie Scherba's Nursing Home (16) All American Nursing Home (144) 817 N. High St. 5440-52 N. Broadway Weatherford Nursing Home (85) Alshore House (53) 318 Buchanan St. 2840 Foster Ave. Woodlawn Acres Convalescent and Anna Hadley Nursing Home (29) Nursing Home (26) 3209 W. Douglas Blvd. W. Hard Rd., State Rt. 108 Arthur W. Devermann Residence (16) CARMI (White County) 5746 N. Sheridan Rd. White County Nursing Home (90) Austin Congress Nursing Home (136) R.R. 3 901 S. Austin Blvd. Wilmar Restorium, Inc. (85) Beachview Convalescent Home, Inc. (47) College Blvd. 6345 N. Sheridan Rd. CARROLLTON (Greene County) Beacon Hill Nursing Home (33) Tower View Nursing Home No. 2 (26) 4530 N. Beacon St. 626 Maple Ave. Beckwith Nursing Home (36) CASEY (Clark County) 3240 W. Washington Blvd. Casey Nursing Home (92) Bell Nursing Home (28) N. 10th St. 11079 S. Bell Ave. Rude's Goodwill Home (22) Belmont Rest Home, Inc. (55) 208 W. Main St. CASEYVILLE (St. Clair County) 1936 W. Belmont Caseyville Nursing Home (31) Beverly Hills Nursing Home (32) 321 O'Fallon St. 10347 Longwood Dr. CENTRALIA (Marion County) Birchwood Beach Convalescent Home No. 1 Centralia Fireside House, Inc. (92) 1030 E. McCord St. 7350 N. Sheridan Rd.

CHAMPAIGN (Champaign County)

BROOKFIELD (Cook County)

Birchwood Beach Convalescent Home No. 2 (32) 7364 N. Sheridan Rd. Byrn Mawr House, Inc. (183) 6141 N. Pulaski Rd. Burke Nursing Home (10) 11840 S. Western Ave. Burnside Rest Home (49) 9435 Langley Ave. Carmen Manor (114) 1470 W. Carmen Ave. Davis Nursing Home, Inc. (85) 725-29 Waveland Ave. Dearborn House, Inc. (128) 2400 S. Dearborn St. Douglas Park Nursing Home (40) 1518-22 S. Albany Ave. Doyle Nursing Convalescent Home (35) 9626 S. Vincennes Ave. Edgewater Manor (42) 5838 N. Sheridan Rd. Elizabeth Olivia Home (49) 3952 S. Ellis Ave. Elsa S. Long Convalescent Home (46) 5250-5256 N. Sheridan Rd. Elston Home, Inc. (114) 4340 N. Keystone Ave. Englewood Rest Haven, Inc. (26) 7253 Yale Ave. Fargo Beach Home, Inc. (143) 7445 N. Sheridan Rd. Farwell Beach Convalescent Home (27) 1145 W. Farwell Ave. Feinstein's Rest Home, Inc. (27) 5960 N. Sheridan Rd. Fontainebleau Manor, Inc. (60) 6318 N. Winthrop Ave. Fox River Pavilion (74) 4700 N. Clarendon Ave. Fullerton Convalescent Home, Inc. (132) 1400 W. Monroe St. Garden View Home, Inc. (130) 6450 N. Ridge Ave. Garfield Nursing Home (28) 3834 W. Washington Blvd. Granville Manor (45) 1021 Granville Ave. Hampden Manor (40) 2724 N. Hampton Ct. Harmon-Bragg Nursing Home, Inc., No. 1 6455 S. Kimbark Ave. Harmon-Bragg Nursing Home, Inc., No. 2

Lake View Manor Rest Home (42) 2824 N. Sheridan Rd. Lehrer Nursing Home, Inc. (40) 4636 N. Beacon St. Lincoln Park Home (33) 2042 N. Orleans St. Linderman Nursing Home, Inc. (25) 3311 W. Monroe St. Malden Nursing Home, Inc. (26) 4616 N. Malden Ave. Maple Nursing Home (10) 4743 W. Washington St. Mark Howard Home (93) 4938 S. Drexel Blvd. Martha Washington Manor, Inc. (99) 4515 S. Drexel Blvd. Melbourne Convalescent Home (188) 4625 N. Racine Ave. Midwest Rest Haven, Inc. (32) 310 S. Hamlin Ave. Miller Nursing Home (46) 3256 W. Douglas Blvd. Misericordia Home (136) 2916 W. 47th St. Monterey Convalescent Home (56) 4616 S. Drexel Blvd. Monterey Convalescent Home (62) 1919 S. Prairie Ave. Montgomery Convalescent Home (80) 5956 S. Wabash Ave. Mortkowicz Kosher Nursing Home (20) 4851 N. Rockwell Ave. Mt. Pisgah Nursing Home (49) 4220-28 S. Champlain Ave. Nesbitt Home (34) 943 W. Foster Ave. (36)North Shore Rest Haven, Inc. (49) 7428 N. Rogers Ave. Ogden Park Convalescent Home (60) 6617-25 S. Racine Ave. Panenka Nursing Home (25) 1901 S. Lawndale Ave. Park House (86) 2320 S. Lawndale Ave. Patterson Convalescent Home (32) 3242 W. Maypole Ave.

Ivory Nursing Home, Inc. (39) 5839 S. Calumet Ave.

3321 W. Fulton St.

3456 W. Franklin Blvd. Kenmore House (109)

5517 N. Kenmore Ave.

Ken-Rose Rest Home (44) 6255 N. Kenmore Ave.

1617 N. Kostner Ave.

7230 N. Sheridan Rd.

6330 N. Sheridan Rd.

Lakeside Nursing Home (24)

Lake Shore Nursing Home, Inc. (27)

Kostner Manor (119)

Johnson Nursing Home, Inc. (41)

Johnson Rehabilitation Nursing Home, Inc.

6463 S. Kimbark Ave. Hastings Nursing Home (14) 7241 S. Princeton Ave. Hearthside Nursing Home, Inc. (73) 1223 W. 87th St. Hollywood Convalescent Home, Inc. (45) 1054 W. Hollywood Ave. Howard Convalescent Home, Inc. (32) 6522 S. Harvard Ave.

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Pedraza Nursing Home, Inc. (19) 309 W. 16th St. 3234 W. Washington St. Riviera Manor Nursing Home, Inc. (110) Peyton Convalescent Home (44) 490 W. 16th Pl. 4541 S. Michigan Ave. CHILLICOTHE (Peoria County) Rabbi Beisels Convalescent Home, Inc. (49) Parkhill Nursing Home (66) 4900 N. Bernard Ave. P.O. Box 259 Ridge Manor Convalescent Home (35) CLINTON (DeWitt County) 5888 N. Ridge Ave. Crest View Nursing Home, Inc. (48) Rosewood Terrace Rest Home, Inc. (69) U. S. Hwy. 51 N. 6668 N. Damen Ave. DeWitt County Nursing Home (42) Royal Manor (28) 5640 N. Sheridan Rd. Pine Crest Nursing Home (41) St. Michael's Rest Haven, Inc. (43) North Center Limits 4815 S. Drexel Blvd. COAL VALLEY (Rock Island County) Sheridan Gardens Convalescent Home, Inc. (99) Oak Glen Nursing Home (286) 1426 W. Birchwood Ave. COLCHESTER (McDonough County) Schiller Rest Home, Inc. (30) Helton Nursing Home (15) 1428 W. Jarvis East St. Shorecrest Convalescent Home, Inc. (35) COLLINSVILLE (Madison County) 7331 N. Sheridan Rd. Pleasant Rest Nursing Home (89) Shore View Manor Convalescent Home, Inc. 614 Summit (31)CREAL SPRINGS (Williamson County) 2719 E. 75th St. Creal Springs Nursing Home (45) South Shore Kosher Rest Home, Inc. (111) S. Line St. 7325 S. Exchange Ave. CRESTWOOD (Cook County) South Shore Pavilion (113) Rest Haven Illiana Christian 7750 South Shore Dr. Convalescent Home, Inc. (99) The Sovereign Home (55) 13259 S. Central Ave., Palos Heights 6159 N. Kenmore Ave. CRETE (Will County) Stern's Convalescent Home, Inc. (37) Skyline Acres (10) 730 Waveland St. Rt. 1, Box 359-20 Stewart Nursing Home, Inc. (23) DANVILLE (Vermilion County) 6710 S. Stewart Ave. Colonial Manor, Inc. (55) Sunnyside Nursing Home (47) 4537 N. Greenview Ave. 629 Warrington Ave. Danville Care, Inc. (98) Sunset Nursing Home, Inc. (192) 1701 N. Bowman Ave. 7270 South Shore Dr. Danville Care, Inc. North (72) Thorndale Manor (41) 1020 W. Thorndale Ave. 1715 N. Bowman Ave. Margenette (31) Uptown Convalescent Home (55) 503 W. North St. 4646 N. Beacon St. Vincennes Manor, Inc. (305) Nance Nursing Home (14) 4724 S. Vincennes Ave. 622 Bryan Ave. Wellington Plaza (91) Vermilion County Nursing Home (191) 504 W. Wellington Ave. R.R. 1, Box 13 Wendt Nursing Home (33) DECATUR (Macon County) 5914 N. Sheridan Rd. American Nursing Center of Decatur (95) West Side Nursing Home, Inc. (36) 444 W. Harrison St. 1900 S. Kedzie Ave. Lakeshore Manor (77) Westwood Manor, Inc. (115) 1293 S. 34th St. 2444 W. Touhy Ave. Mabel's Nursing Home (29) Whitehall Convalescent and Nursing 820 W. North St. Home, Inc. (91) Macon County Tuberculosis Sanatorium 1901 N. Lincoln Park West & Nursing Home (34) Wincrest Nursing Home, Inc. (49) 400 W. Hay 6326 N. Winthrop Ave. Mary Ann's (28) Winston Manor Convalescent and 640 W. Main St. Nursing Home, Inc. (178) Muirheid Nursing Home (20) 2155 W. Pierce Ave. 231 E. Condit St. Wrightwood Nursing Home, Inc. (90) Muirheid's Nightingale Manor (21) 2732 Hampden Ct. 805 E. Johns Ave.

CHICAGO HEIGHTS (Cook County)

Bel-Air Nursing Home No. 2 (21)

Pedraza Nursing Home, Inc. (31)

3230 W. Washington St.

Strong's Nursing Home (18) Rollin Hills Rest Home (96) 936 N. Church St. Rollin Hills Subdivision Wakefield Aged Retreat Home (22) ELDORADO (Saline County) 1504 N. Water St. Eldorado Nursing Home, Inc. (49) Wakefield Rest Home (26) Third and Locust Sts. 800 W. McKinley Ave. Good Shepherd Nursing Home No. 1 (61) West View Nursing Home (19) First and Jasper Sts. 628 W. Main St. ELGIN (Cook County) Little Angels (45) DeKALB (DeKalb County) Rt. 3, Box 201A, Rt. 58 DeKalb County Nursing Home (136) ELGIN (Kane County) Sycamore Rd., R.R. 23 Daybreak Nursing Home (27) Pine Acres Retirement Center (60) 420 Douglas Ave. 1212 S. Second St. Elgin-Bowes Nursing Home (49) DesPLAINES (Cook County) 105 N. Gifford St. Brookwood Convalescent Center, Inc. (111) Hillcrest Convalescent Home, Inc. (26) Lyman and Dempster Sts. 4 N. Jackson St. Des Plaines Convalescent Home (28) Isabelle Home (18) 866 Lee St. 104 S. State St. Golf Road Pavilion (142) Mary Margaret Manor (94) 9555 W. Golf Rd. 134 N. McLean Blvd. Graceland Home of DesPlaines, Inc. (41) Oliver Nursing Home, Inc. (25) 545 Graceland Ave. 325 Watch St. DIXMOOR (Cook County) Raloff Nursing Home (10) Starnes Nursing Home (39) 316 Division St. 14434 S. Hoyne Ave. Simpson House, Ltd. (67) DIXON (Lee County) 170 S. State St. Lee County Nursing Home (84) ELMHURST (DuPage County) R.R. 4 Elmhurst Nursing Home (42) Orchard Glen, Inc. (58) 200 E. Lake St. 141 N. Court St. ELMWOOD (Peoria County) DOLTON (Cook County) Elm Haven, Inc. (75) Sandra Memorial Nursing and Convalescent EL PASO (Woodford County) Home (61) McDaniel Nursing Home (33) 14325 S. Blackstone Ave. 404 E. First St. DOWNER'S GROVE (DuPage County) Lewis Nursing Home, Inc. (17) Highland House Nursing Home, Inc. (62) 487 Elmwood Ct. 35th St. and Highland Ave. EVANSTON (Cook County) DUNDEE (Kane County) Broad Nursing Home (25) Bowes Nursing Home (49) 2001 Orrington Ave. 305 Oregon St. Dobson Plaza, Inc. (52) Gregg Nursing Home (31) 120 Dodge Ave. 417 E. Hill St. Evanston Convalescent Center, Inc. (65) DUQUOIN (Perry County) 1300 Oak Ave. Fair Acres Nursing Home (76) Klingler Nursing Home (5) Jackson and Madison Sts. 2306 Ridge Ave. DURAND (Winnebago County) Pembridge House, Inc. (96) Medina Nursing Center (66) 1406 Chicago Ave. P.O. Box 538 Ridge Crest Home (21) EAST ST. LOUIS (St. Clair County) 1708 Ridge Ave. Carr Nursing Home (47) Three Oaks Nursing Center (124) 3110 Bond Ave. 500 Asbury Ave. Fletcher Ann Convalescent Home (38) EVERGREEN PARK (Cook County) 2640 St. Louis Ave. Bel Air Nursing Home (20) Lively Nursing Home (327) 9307 S. Crawford Ave. 1303 Baugh Ave. Evergreen Gardens, Inc. (162) EDWARDSVILLE (Madison County) 9125 S. Crawford Ave. Anna-Henry Nursing Home (84) Evergreen Manor Nursing Home (22) 637 Hillsboro 3327 W. 95th St. Madison County Nursing Home (59) Gunderson's Convalescent & Nursing Main St. Home (17) EFFINGHAM (Effingham County) 2701 W. 95th St. Marks Nursing Home (20) Peace Memorial Home (160) 406 E. Jefferson 10124 S. Kedzie Ave.

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FAIRBURY (Livingston County) Helen Lewis Smith Pavilion (23) 519 S. Sixth St. FARMER CITY (DeWitt County) Farmer City Nursing Home, Inc. (22) 326 Clinton Ave. Jackson Heights Nursing Home (49) Brookview Dr. and Crabtree Ct. FLORA (Clay County) Raber Nursing Home (28) 402 E. Fourth St. FREEBURG (St. Clair County) Marian Nursing Home (17) 406 State St. FREEPORT (Stephenson County) Benjamin Stephenson Nursing Home (56) Walnut Rd. Crestview Manor, Inc. (42) 565 N. Turner Ave. Van Buren Nursing Home (20) 503 N. Van Buren FULTON (Whiteside County) Harbor Crest Home, Inc. (49) 810 E. 17th St. GALATIA (Saline County) Good Shepherd Nursing Home No. 2 (45) Main and Cross Sts. GALENA (Jo Daviess County) Sunny Hill Nursing Home (32) 513 Bouthillier St. GALESBURG (Knox County) Americana Nursing Center of Galesburg (67) 270 E. Losey at Kellogg Campbell Nursing Home (16) 731 N. Seminary Harvey Nursing Home (19) 774 N. Broad St. Powell Nursing Home (17) 620 S. Academy Schrader Nursing Home (17) 490 N. Cherry GENESEO (Henry County) Wright Nursing Home (28) 426 W. First St. Henry County Convalescent Home (126) R.R. 4 GENEVA (Kane County) Anna Baum Home (36) 115 Campbell St.

GENOA (DeKalb County) Villa Nursing Home (30) 121 Main St. GIBSON CITY (Ford County) Gibson Community Hospital Annex (40) 430 E. 19th St. Gibson Manor, Inc. (47) 525 Hazel Dr. GILLESPIE (Macoupin County) Tower View Nursing Home No. 3 (8) 703 S. Second St. GLEN ELLYN (DuPage County)

Manor Convalescent Home, Inc. (49)

818 DuPage Rd.

GLENVIEW (Cook County) Golf Mill Nursing Home, Inc. (37) 77 Greenwood Ave. Whitehaven Acres, Inc. (32) Greenwood Ave. and Melody Ln. GODFREY (Madison County) Blu-Fountain Manor, Inc. (75) Rt. 100 GRANITE CITY (Madison County) The Colonnades (82) 1 Colonial Dr. GRAYVILLE (White County) Baldwin Nursing Home, Inc. (54) 305 W. North St. GREENFIELD (Greene County) Cedar Knoll Nursing and Convalescent Home (29) 711 Bluff St. GREENVILLE (Bond County) Bourgeois Nursing Home, Inc. (32) 100 W. College St. GRIDLEY (McLean County) Dowell Nursing Home (21) 202 W. Sixth St. HAMPSHIRE (Kane County) Hampshire Nursing Home (64) Jackson and Warner Sts. Lydia Nursing Home (20) 25 W. Jackson St. HARDIN (Calhoun County) Sunrise Nursing Home (20) HARRISBURG (Saline County) Bacon's Nursing Home, Inc. (21) Box 269, N. Granger St. Country Club Manor (68) 1000 W. Sloan HARVARD (McHenry County) Harvard Rest Home (44) 210 E. Front St. HARVEY (Cook County) Heather Manor Convalescent Center (49) 15600 S. Honore Ave. HAVANA (Mason County) Havana Nursing Home (43) 224 W. Mound St. HERRIN (Williamson County) Hampton Nursing Home (30) 321 S. 14th St. Mattingly Nursing Home, Inc. (34) 920 S. 14th St. HICKORY HILLS (Cook County) Villa Marie Nursing Home, Inc. (78) 9246 S. Roberts Rd., Oak Lawn HIGHLAND (Madison County) Helvetia Nursing Home (49) 2510 Lemon Street Rd. Miles Nursing Home (26)

817 Ninth St.

Abbott House (65)

405 Central Ave.

HIGHLAND PARK (Lake County)

HIGHWOOD (Lake County) Knox County Nursing Home (200) Pavilion of Highland Park (59) 219 N. Market St. 50 Pleasant Ave. St. Martha's Nursing Home, Inc. (46) HILLSBORO (Montgomery County) N. Market St. Hillsboro Nursing Home (51) LACON (Marshall County) 624 S. Main St. St. Joseph's Nursing Home (54) HILLSIDE (Cook County) 401 Ninth St. Oakridge Convalescent Home (42) LaGRANGE (Cook County) LaGrange Colonial Manor Convalescent and 323 Oakridge Ave. HINSDALE (DuPage County) Nursing Center (179) Oaks Nursing Home (49) 339 N. Ninth Ave. Rt. 83 and 91st St. LaGrange Convalescent and Nursing Shank Rest Home (31) Center (58) 525 .W. Ogden Ave. 42 S. Ashland Ave. HOPEDALE (Tazewell County) LAKE BLUFF (Lake County) Hopedale Nursing Home (86) Hill Top Farm (14) 502 N. Waukegan Rd. Second St. LAKE VILLA (Lake County) INA (Jefferson County) Underwood Nursing Home (15) Hampstead House (28) 601 S. Rt. 59 3 Elm St. IRVING (Montgomery County) Lake Villa Nursing Home (30) Rest Haven, Inc. (30) 201 Cedar Ave. Venetian Manor Convalescent Home (30) JACKSONVILLE (Morgan County) Lasley Nursing Home (20) 1913 E. Grand Ave., Lindenhurst Addition 844 W. College Ave. LAKE ZURICH (Lake County) Meline Nursing Center (90) Bee Dozier's Maple Hill Nursing Home, 1024 W. Walnut St. Inc. (86) Modern Care Convalescent and Nursing P.O. Box 288 LANSING (Cook County) Home (40) 1500 W. Walnut St. Tri-State Manor Nursing Home (56) JERSEYVILLE (Jersey County) 2500-175th St. Garnet Nursing Home (37) LAWRENCEVILLE (Lawrence County) 602 W. Pearl St. Shidler Nursing Home (22) Green Lawn Nursing Home (35) 1022 Twelfth St. 518 S. State St. LEBANON (St. Clair County) Waters Nursing Home (21) Bohannon Nursing Home, Inc. (24) 408 N. Giddings St. 404 S. Fritz St. JOLIET (Will County) LENA (Stephenson County) Americana Nursing Center of Joliet (92) Ortiz Convalescent Home (33) 300 N. Madison 516 Schuyler St. Broadway Nursing Home (70) LEWISTOWN (Fulton County) 216 N. Broadway Clarytona Manor, Inc. (96) LeSan Nursing Home (25) Sycamore Dr. 601 Campbell St. Stephens Nursing Home (23) Lincoln Nursing Home (142) 305 S. Main St. 611 E. Cass St. LEXINGTON (McLean County) Pleasant Center Nursing Home (38) Three Oaks Nursing Home (48) 5 S. Center St. 301 S. Vine St. Sunny Hill Nursing Home (41) LIBERTYVILLE (Lake County) 501 Ella Ave. Lake County Nursing Home (153) KANKAKEE (Kankakee County) 1125 N. Milwaukee Ave. Americana Nursing Center of Kankakee (92) Magnus Rest Home (25) 900 W. River Pl. 1206 S. Milwaukee Ave. Casper Nursing Home (30) LINCOLN (Logan County) 480 E. Oak St. Abraham Lincoln Memorial Extended Deerwood Convalescent Home (57) Care (53) R.R. 5, Aroma Park Rd. 315 Eighth St. KEWANEE (Henry County) Christian Nursing Home (48) Spoon River Residence (41) 1507 Seventh St. 401 Pine St. Mary Henry Nursing Home (52) KNOXVILLE (Knox County) 1700 Fifth St. Good Samaritan Nursing Home (49) Wasson Nursing Home (19) 407 N. Hobart St. 1011 Third St.

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LITCHFIELD (Montgomery County) Friendly Haven Nursing Home (28) 823 Chapin St.

Litchfield Nursing Home (48) 628 S. Illinois St.

LOUISVILLE (Clay County)

Hill Crest Nursing Home (40)
Chestnut St.

LOVES PARK (Winnebago)

Fountain Terrace (49) 6131 N. 2nd St.

MACOMB (McDonough County)

Americana Nursing Center of Macomb (58) 120 Doctors Ln.

MARENGO (McHenry County)

Florence Nursing Home (46)

546 E. Grant Hwy.

MARION (Williamson County)

Fountains Nursing Home (68)

1301 E. DeYoung St. MAROA (Macon County)

Villa Maria Nursing Home (14)

125 S. Main St.

MARSHALL (Clark County)

Burnsides Nursing Home, Inc. (90) N. Second St.

MASCOUTAH (St. Clair County)

Grange Nursing Home (29)

Tenth St. (R.R. 1, Box 145)

Mascoutah Nursing Home (22)

213 E. Church St.

West Main Nursing Home (16)

1244 W. Main St.

MASON CITY (Mason County)

Christian Care Nursing Home (21)

705 E. Chestnut St.

MATTOON (Coles County)

Cunningham Nursing Home (31)

1312 Wabash Ave.

Douglas Nursing Center (49)

State Hwy. 121W

MAYWOOD (Cook County)

Lendino Nursing Home, Inc. (14)

1110 S. Ninth Ave.

McHENRY (McHenry County)

Villa Nursing Home (68)

1201 W. Rocky Beach

MENDOTA (LaSalle County)

Sunrise Nursing Home (49)

1201 First Ave.

METROPOLIS (Massac County)

Metropolis Good Samaritan Home (48) Box 145

MIDLOTHIAN (Cook County)

Bowman Nursing Home, Inc. (44)

14731 S. Turner Ave.

Bowman Nursing Home, Inc., No. 1 (49) 3249 W. 147th St.

Clover Acres (49)

5252 W. 147th St.

Largent's Convalescent Home (69)

4323 W. 147th St.

Maple Farms Convalescent Home (44) 147th & Long Ave.

MILAN (Rock Island County)

Comfort Harbor Nursing Home (39)

114 W. Second Ave.

MINONK (Woodford County)

Minonk Manor, Inc. (48)

201 Locust St.

MOLINE (Rock Island County)

Americana Nursing Center of Moline (67) 833 Sixteenth St.

Fairhaven Nursing Home (28)

2525 Ninth Ave.

MONMOUTH (Warren County)

Colonial Nursing Home, Inc. (23)

303 E. Broadway

Monmouth Nursing Home (28)

116 S. H St.

Warren County Nursing Home (39)

R.R. 4

MONTICELLO (Piatt County)

Cozy Haven (10)

713 W. Bond St.

Piatt County Nursing Home (32)

R.R. 2

MORRIS (Grundy County)

Morris-Lincoln Nursing Home (87)

916 Fremont Ave.

Grundy County Nursing Home (49)

R.R.4

MORRISON (Whiteside County)

Eveningside Nursing Home (23)

509 N. Genesee St.

MORRISONVILLE (Christian County)

Memorial Nursing Home (47)

200 W. Fifth St.

MORTON (Tazewell County)

Restmor, Inc. (132)

925 E. Jefferson

MT. CARMEL (Wabash County)

Monticello Nursing Home, Inc. (97)

Box 229

Wabash Nursing Home (30)

R.R. 3

MT. STERLING (Brown County)

Barker's Nursing Home (15)

204-206 Railroad Ave.

Haley's Nursing Home (10)

401 W. Main St.

Whited Nursing Home (20)

308 N. Capital St.

MT. VERNON (Jefferson County)

Hickory Grove Manor (111)

8 Doctors Park Rd.

Lowry's Nursing Home (27) 1304 Main St.

1304 Main St.

Setzekorn Nursing Home (31)

1300 Broadway

MT. ZION (Macon County)

Woodland, Inc., Nursing Home (70)

MUNDELEIN (Lake County)

North Riverwood Manor, Inc. (65)

Rt. 1, 106 Milwaukee Ave., Half Day

ODIN (Marion County) Pine Manor (27) Wutzler Nursing Home (29) Rt. 1, Box 185 Kirkwood St. MURPHYSBORO (Jackson County) Yaw Nursing Home (61) Jackson County Nursing Home (158) Laury St. 1441 N. 14th St. O'FALLON (St. Clair County) Tyler Nursing Home, Inc. (69) Parkview Colonial Manor (107) 1711 Spruce St. 300 Weber Dr. NAPERVILLE (DuPage County) OKAWVILLE (Washington County) Americana Nursing Center of Naperville (97) Washington Springs Nursing Home (130) 200 Martin Dr. OLNEY (Richland County) Brentwood Nursing Home (29) Burgin Nursing Home No. 1 (31) 1136 Mill St. 305 S. Washington St. NASHVILLE (Washington County) Burgin Nursing Home No. 2 (29) Frendship Manor, Inc. (125) 607 S. Elliott St. Friendship Dr. Burgin Nursing Manor (75) NEWTON (Jasper County) 928 E. Scott St. Newton Rest Haven (92) Golden Years Nursing Home (34) 300 S. Scott St. 502 S. Fair St. NILES (Cook County) Marks Nursing Home (28) Gross Point Manor (99) 217 N. Fair St. 6601 Touhy Ave. ORANGEVILLE (Stephenson County) Pleasantview Convalescent and Nursing Krug Convalescent Home (13) Center, Inc. (91) High St. 6840 W. Touhy Ave. OTTAWA (LaSalle County) Svithoid Nursing Home (23) Hassley's Health Haven (16) 8800 Grace St. Gentleman Rd., R.R. 4 NORMAL (McLean County) Highland Sanatorium and Convalescent Americana Nursing Center of Home of LaSalle County (63) Bloomington-Normal (88) 800 Center St. 510 Broadway LaSalle County Home (68) Brokaw Home (46) Virginia and Franklin Sts. Susie H. Moore Rest and Healing Home (13) NORTHBROOK (Cook County) 627 Third Ave. Eden View Convalescent and Geriatric PALATINE (Cook County) Center (142) Bee Dozier's Palatine Nursing Home (40) 222 Frontage Rd. W. Dundee Rd. Northbrook Nursing Home & Rehabilitation Plum Grove Nursing Home, Inc. (48) Center, Inc. (149) 24 S. Plum Grove Ave. 270 Skokie Rd. PALOS HILLS (Cook County) Palos Hills Convalescent Center (130) OAK LAWN (Cook County) 10426 S. Roberts Rd. Concord Nursing Home (91) PANA (Christian County) 9401 Ridgeland Ave. DePaepe-Ashcraft Nursing Home (83) Doyle Nursing and Convalescent Homes, 10 Oak St. Inc. (92) 5432 W. 87th St. PARK RIDGE (Cook County) Monticello Convalescent Center (99) Park Ridge Terrace (56) 665 Busse Hwy. 6300 W. 95th St. Oak Lawn Convalescent and Geriatric PAXTON (Ford County) Home (95) Ford County Nursing Home (74) 9525 S. Mayfield R.R. 2 Parkside Gardens Nursing Home (77) Lyons Nursing Home (21) 5701 W. 79th St. 440 E. Pells St. PEKIN (Tazewell County) OAK PARK (Cook County) Oak Park Nursing Home, Inc. (41) Floy's Nursing Home (24) 803 Park Ave. 637 S. Maple Ave. Patterson Nursing & Rehabilitation Care (22) Knollcrest Nursing Home (49) Allentown Rd. 130 N. Austin Blvd. PEORIA (Peoria County) Royal Oak Convalescent and Geriatric Americana Nursing Center of Peoria (65) Center (204) 625 N. Harlem Ave. 5600 Glen Elm Dr. The Woodbine (59) Baker Nursing Home (28)

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6909 W. North Ave.

500-502 W. Second St.

Bel-Wood Nursing Home (237) ROBBINS (Cook County) Esma A. Wright Convalescent Center (206) 7023 W. Planck Rd. High View Nursing Home (68) 139th St. at Lydia 2308 W. Nebraska St. ROBINSON (Crawford County) Mahoney Nursing Home No. 1 (28) Gowen Nursing Home (49) 444 W. Second St. 902 Mefford St. Mahoney Nursing Home No. 2 (19) Robinson Nursing Home (44) 2149 N. Knoxville St. 503 E. Main St. Walker Nursing Home (16) ROCHELLE (Ogle County) 1504 W. Garden St. Americana Nursing Center of Rochelle (49) PEORIA HEIGHTS (Peoria County) 900 N. Third St. Fireside House, Inc. (108) ROCK FALLS (Whiteside County) 1629 Gardner Ln. Riverview Nursing Home Galena Park Home (24) 303 E. Second St. 5533 N. Galena Rd. Colonial Acres Rest Home (55) PERU (LaSalle County) Rt. 2, Dixon Rd. Heritage Manor (59) ROCKFORD (Winnebago County) 22nd and Rock Sts. Alma Nelson Manor (174) Tri City Nursing Home (21) 550 S. Mulford Rd. 2804 Sixth St. Americana Nursing Center of Rockford (114) PETERSBURG (Menard County) 2313 N. Rockton Menard Convalescent Center, Inc. (54) Deacon Home (17) Seventh and Antle Sts. 611 N. Court St. Sunny Acres (49) Johnson's Hill Top Nursing Home (16) Rt. 3 728 N. Court St. PITTSFIELD (Pike County) Lund Nursing Home (17) Couch Nursing Home (35) 1503 Fourth Ave. 521 E. Washington St. North Rockford Convalescent Home (49) Pittsfield Nursing Home (74) 1925 Fremont St. R.R. 3 The Restorium (41) PLYMOUTH (Hancock County) 2800 S. Main St. Myrtle Sapp's Nursing Home (22) River Bluff Nursing Home (204) N. Main Rd. PONTIAC (Livingston County) River Manor, Inc. (108) 707 W. Riverside Blvd. Livingston County Nursing Home (120) Rockford Municipal Sanitarium Nursing R.R. 1 Home (59) PRAIRIE CITY (McDonough County) 1601 Parkview Ave. Westfall K & C Nursing Home (9) ROCK ISLAND (Rock Island County) Reed and Union Sts. Mrs. Carroll's Nursing Home (26) Westfall Nursing Home (22) 4434 Seventh Ave. Madison and Union Sts. Parkway Rest Home (22) PRINCETON (Bureau County) 557-30th St. Prairie View Nursing Home (149) Shady Lawn Nursing Home, Inc. (29) R.R. 5 1018 Twelfth St. QUINCY (Adams County) ROSEVILLE (Warren County) Eloise Nursing Home (13) Roseville Nursing Home (18) 1614 N. Fourth St. N. Main St. Hall Nursing Home (23) ROSSVILLE (Vermilion County) 1870 Vermont St. Hedrecka Nursing Home (32) Lincoln-Terrace Nursing Home, Inc. (92) R.R. 2 1315 N. Eighth St. ROUND GROVE (Whiteside County) St. Joseph Hall (72) 1415 Vermont St. Whiteside County Nursing Home (75) Theda Boll Nursing Home (14) RUSHVILLE (Schuyler County) 438 N. Twelfth St. Hills Convalescent Home (20) 717 E. Adams RAYMOND (Montgomery County) Snyder's Home (49) Cottage Nursing Home (33) W. Sparks St. 135 Morgan St. ROANOKE (Woodford County) RUTLAND (LaSalle County) Roanoke Manor, Inc. (79) Rutland Nursing Home, Inc. (27)

E. Front St. and Chestnut St.

1102 W. Randolph St.

ST. ELMO (Fayette County) Everett McKinley Dirksen House (152) Elm Haven Nursing Home (24) 555 W. Carpenter 317 Cumberland Rd. Hamilton Nursing Home (24) ST. CHARLES (Kane County) 925 N. Fifth St. Haven Nursing Home (72) Valley Rest Home (24) 309 S. Sixth Ave. 2301 W. Monroe SANDWICH (DeKalb County) Homestead Convalescent Home and Sandhaven, Inc. (37) Nursing Residence (60) 517 N. Main St. 127 N. Douglas Ave. SALEM (Marion County) Myrick Nursing Home (31) Twin Willows Nursing Center (72) 925 S. Seventh St. Rt. 37 North Myrick Nursing Home, East (25) SAYBROOK (McLean County) 2205 E. Capitol Kinsell's Nursing Home, Inc. (16) Phillips Nursing Home, Inc. (51) 205 N. Main St. 630 N. Sixth St. SHANNON (Carroll County) Ramshaw Retirement Home No. 1 (47) Johnson's Nursing Home (59) 631 N. Sixth St. 418 Ridge St. Ramshaw Retirement Home No. 2 (44) 611 N. Sixth St. SHAWNEETOWN (Gallatin County) Loretta Nursing Home (61) Ridgewood Nursing Home (48) 3400 Peoria Rd. Logan and Lincoln Sts. Rutledge Manor Care Home, Inc. (121) SHELBYVILLE (Shelby County) 819 N. Rutledge Young's Shelbyville Restorium, Inc. (110) STAUNTON (Macoupin County) Rt. 128 North Staunton Nursing Home, Inc. (36) SHELDON (Iroquois County) 215 W. Pennsylvania St. Happy Siesta (40) STERLING (Whiteside County) 220 E. Center St. Colonial Acres Rest Home (70) SIDELL (Vermilion County) Fairview Alliance Home, Inc. (37) STOCKTON (Jo Daviess County) Morgan Memorial Home (27) SILVIS (Rock Island County) 501 E. Front Ave. Happy Haven Rest Home (49) STREATOR (LaSalle County) 118 Tenth St. Edgetown Nursing Home (24) SKOKIE (Cook County) Richards and Chicago Sts. Old Orchard Manor (61) Heritage Manor (57) 4660 Old Orchard Rd. 1525 E. Main St. Skokie Valley Manor, Inc. (115) Star Haven Convalescent and Nursing 4600 W. Simpson St. Home (21) Village Nursing Home in Skokie, Inc. (128) 405 N. Wasson St. 9000 Lavergne Ave. SULLIVAN (Moultrie County) SMITHBORO (Bond County) East View Manor Nursing Home (52) American Nursing Home (28) Eastview Pl., Box 234 SOUTH CHICAGO HEIGHTS (Cook County) Singiser Nursing Home (30) Suburban Convalescent Center (99) 817 E. Jackson St. 120 W. 26th St. SUMNER (Lawrence County) SOUTH HOLLAND (Cook County) Red Hills Rest Haven (96) Colonial Convalescent Home (65) Pine Lawn Addition 549 E. 162nd St. SWANSEA (St. Clair County) SPARTA (Randolph County) Castle Haven Convalescent Center (154) Randolph County Nursing Home (158) 225 Castellano Dr. W. Belmont TAYLORVILLE (Christion County) SPRINGFIELD (Sangamon County) Dexheimer Nursing Home (21) Americana Nursing Center of Springfield (116) 216 E. Franklin St. 707 N. Rutledge Johnson Nursing Home (12) Carver Convalescent Home (61) 1024 W. Park 1527 E. Washington St. Meadow Manor (56) Claudia's Nursing Home (51) Rt. 48 North 409 N. Grand Ave. East Smith's Guest Home (40) Colonial Cottage (4) 305 E. Adams St. 116 S. State St. TINLEY PARK (Cook County)

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1625 E. Edwards St.

Edwards Manor Nursing Home, Inc. (60)

Kosary Nursing Home (73)

6660 W. 147th St.

WAUKEGAN (Lake County) McAllister Nursing Home No. 2 (45) The Terrace Nursing Home (112) 183rd and LaVerne Ave. TREMONT (Tazewell County) 1615 Sunset Ave. Waukegan Pavilion Nursing Home, Inc. (96) Tazewell County Nursing Home (125) 2217 W. Washington St. WAVERLY (Morgan County) TROY (Madison County) Rockwood Rest Home (23) Bridges Nursing Home (18) 212 N. Powell St. 200 E. State St. TUSCOLA (Douglas County) WENONA (Marshall County) Martin Nursing Home (30) Wenona Rest Haven, Inc. (31) 114 E. Daggy St. URBANA (Champaign County) WEST CHICAGO (DuPage County) Americana Nursing Center of Champaign-Hazelhurst Nursing Home, Inc. (29) Urbana (100) Roosevelt Rd. and Gary Mill 600 N. Coler Morton Manor Health Home (28) Champaign County Nursing Home (198) R.R. 1, Box 753 1701 E. Main St. WHEATON (DuPage County) Fontana Nursing Care Center (40) DuPage Convalescent Home (288) 907 Lincoln Ave. 262 County Farm Rd. Hubert Nursing Home (19) Parkway Terrace Nursing Home (69) 505 W. Green St. 205 E. Parkway Dr. VANDALIA (Fayette County) Wheaton Health Resort, Inc. (96) Fayette County Hospital Annex (33) 1325 Manchester Rd. 727 W. Jackson WHITE HALL (Greene County) Fayette County Nursing Home (34) Hill Top Haven (39) R.R. 3 McCarthy Ave. and U.S. Rt. 67A Ted Mangner Nursing Home, Inc. (31) WINFIELD (DuPage County) 117 S. Seventh St. Abbey Winfield Geriatric & Convalescent VIENNA (Johnson County) Home (48) Hill View (49) Wynwood Rd. and Shady Way VILLA PARK (DuPage County) Zace Retirement Home (41) Acre View Nursing Home (38) 27 W 141 Liberty St. 538 S. Villa Ave. WITT (Montgomery County) VIRDEN (Macoupin County) Laura Charles Nursing Home, Inc. (37) Miller's Nursing Home (23) Allen St. 231 E. Deane St. WOOD DALE (DuPage County) VIRGINIA (Cass County) Wood Dale Nursing Home (70) Kirkpatrick Nursing Home (24) 140 N. Hemlock 145 N. Front St. WOODSTOCK (McHenry County) Walker Nursing Home (30) Birchwood Nursing Home (13) 530 E. Beardstown St. R.R. 1 WARREN (Jo Daviess County) New Woodstock Residence (112) Daters Nursing Home (18) 309 McHenry Ave. Water St. Valley Hi Nursing Home (61) Lahey Nursing Home (23) 2406 Hartland Rd. Burnett St. Sunnyside Nursing Home (15) Windgate (32) 11023 Rt. 14 206 Lions St. WASHBURN (Woodford County) Washburn Nursing Home (32) 231 Parkside Dr. Inc. (33) WASHINGTON (Tazewell County) Washington Nursing Center (88) 1110 New Castle Rd. Rt. 34 and Prairie Ln. Washington Home (36) 104 E. Holland St.

YORKVILLE (Kendall County) Hillside Nursing and Convalescent Home, Rt. 34 and Game Farm Rd. Hillside Nursing and Convalescent Home, Inc., No. 2 (35) ZION (Lake County) Golden Day Nursing Home (32) 923 Shiloh Blvd. Parkview Nursing Home, Ltd. (70) 1911-27th St. Zion Nursing Home (144) 2561 Sheridan Rd.

WATERLOO (Monroe County)

WATSEKA (Iroquois County) Iroquois Resident Home (58)

830 S. Fourth St.

Illinois Ave.

Monroe County Nursing Home (178)

SHELTERED CARE HOMES

BETHANY (Moultrie County) ALEDO (Mercer County) White Shelter Care Home (19) Fortner Sheltered Care Home (36) 513 E. Main St. 1006 E. Fifth St. ALTON (Madison County) BLOOMINGTON (McLean County) Alby Street Sheltered Care Home (30) Eden's Sheltered Care Home (12) 1912 Alby St. 1108 N. Prairie St. Burt Sheltered Care Home (29) Golden Age Home (19) 1414 Milton Rd. 412 N. Roosevelt Ave. Mitchell Sheltered Care Home (6) Hanson Sheltered Care Home (17) 1800 Belle St. 909 S. Center St. Rose Lawn Shelter Care Home No. 3 (10) West Shelter Care Home (23) 1914 Washington Ave. 903 W. Mulberry St. Yinger Resident Home (22) Rusk Haven Shelter Home (42) 2224 State St. 102 Greenwood Ave. ANNA (Union County) BLUE ISLAND (Cook County) Dodson Shelter Care Home (18) Stocker's Sheltered Care Home (12) 300 South St. 2346 Union St. Galbraith Shelter Care Home (17) BRADFORD (Stark County) 223 W. Vienna St. Bradford Home (23) HS&D Sheltered Care Home (12) 214 E. Main St. 201 E. High St. BRADLEY (Kankakee County) Pitts Sheltered Care Home (19) Evans Shelter Care Home (7) 310 E. Davie St. 496 S. Wabash St. Walnut Grove Shelter Care (15) BRIGHTON (Jersey County) 612 E. Davie St. Post Sheltered Care Home (12) ARROWSMITH (McLean County) Strack St., P.O. Box 161 Murrell's Guest Home (6) BUNKER HILL (Macoupin County) ASHLAND (Cass County) Hammond Shelter Care Home (26) Burch Home (10) 512 S. Franklin ASHMORE (Coles County) BUSHNELL (McDonough County) Ashmore Estates (42) Daly's Golden Age Home (17) BARTONVILLE (Peoria) 257 E. Hail St. Martin's Sheltered Home (28) CAMBRIDGE (Henry County) 10 McClure Ct. Pine Lodge Home (17) BARRY (Pike County) 112 E. Center St. Tittsworth Sheltered Care Home (8) Rogers St. CANTON (Fulton County) BELLEVILLE (St. Clair County) Sunset Home (46) Gorski Old Folks Home (12) 135 S. First St. 1412 W. Main St. Sunset Sheltered Care Home No. 2 (52) Gribler Sheltered Care Home (15) 129 S. First Ave. 511 S. Charles St. CARTHAGE (Hancock County) Heidelberg Retirement Home (16) Welborn Shelter Care Home No. 2 (17) 200 Abend St. 140 Main St. Weier Retirement Home (28) CASEY (Clark County) 5 Gundlach Pl. Rude's Goodwill Shelter Home (12) BENTON (Franklin County) 110 E. Monroe St. Cockrum Sheltered Care Home (12) CENTRALIA (Clinton) 314 S. Main St. Brookside Manor, Inc. (41) Good Samaritan Sheltered Care Home (13) 200 W. Broadway 904 E. Main St. CENTRALIA (Marion County) Higgerson's Home (14) Brewer Shelter Care Home (14) 209 N. Eighth St. 603 N. Walnut St. Mary Grace Sheltered Care Home (12) Centralia Friendship House, Inc. (58) 112 Smith St. 1000 E. McCord St. Severin Sheltered Care Home (12) Centralia Shelter Care (20) 105 Mill St. 620 E. Broadway Shady Rest Sheltered Care (18) 114 E. Webster St. CHEBANSE (Iroquois County) Wertz's Sheltered Care Home (13) Morgan Manor (10)

217 Pope St.

243 S. First St.

Popejoy's Retirement Home (27) CHAMPAIGN (Champaign County) 1504 Illinois Ave. LaDow Sheltered Care Home (23) EFFINGHAM (Effingham County) 406 S. Prairie St. Ireland Sheltered Care Home (7) Pleasant Manor (15) 111 Forest St. 211 E. Clark St. Marks Sheltered Care Home (22) CHARLESTON (Coles County) 500 Clinton Ave. Teaters Sheltered Care Home (32) ELDORADO (Saline County) Fifth and Jackson Sts. Murray Hotel (34) Young Sheltered Care Home (18) 900 Fifth St. 763 Tenth St. ELGIN (Kane County) CHENOA (McLean County) The Oliver Annex (11) Rose Lawn Sheltered Care Home No. 2 (20) 364 St. Charles St. 324 Weir St. EL PASO (Woodford County) CHESTER (Randolph County) Padgett's Pot-A-Pourri Rest Home (34) Elderly Citizens Home (24) Main St. 647 State St. Tobien Elderly Citizens Home (27) CHICAGO (Cook County) 408 First St. Boulevard Home (19) ENFIELD (White County) 4533 W. Washington Blvd. Continental Medical Management Corp. (61) Fields Shelter Care Home (20) W. Main St. 5148 S. Prairie Ave. FAIRFIELD (Warren County) Jewish Peoples Convalescent Home (37) Fair Haven Shelter Care Home (9) 6512 N. California Ave. 507 W. Elm St. Kraus Home, Inc. (27) FLORA (Clay County) 1620 W. Chase Ave. Anderson's Sheltered Care Home (12) CLINTON (DeWitt County) 201 E. Third St. Burns Sheltered Care (5) Cottengaim Shelter Care (8) 930 N. George 215 W. Second St. COBDEN (Union County) Ferguson Sheltered Care Home (6) Tripp Sheltered Care Home (28) 520 W. North Ave. Box 323 Raber Sheltered Care Home (6) COLLINSVILLE (Madison County) 409 E. Third St. Butler Home (16) GALESBURG (Knox County) 413 Vandalia St. Barre's Sheltered Care Home (13) COULTERVILLE (Randolph County) 1179 E. Main St. Coulterville Sheltered Care Home (21) The Evergreens (14) Seventh and Cedar Sts. 1188 W. Main St. DALLAS CITY (Henderson County) Lee's Sheltered Care Home (14) Welborn Sheltered Care Home (10) 736 N. Kellogg St. 69 E. Main St. GALVA (Henry) DANVERS (McLean County) Galva Manor (27) Holman Shelter Care Home (18) 309 N. First St. 300 E. Exchange St. GOLCONDA (Pope County) DECATUR (Macon County) Farrar Sheltered Care Home (14) Millis Sheltered Care (10) Monroe St. 1860 N. Broadway St. Rose View Sheltered Care Home (10) Gladville Home (12) Washington and Harrison Sts. 1013 W. Wood St. Lindsey Rest Home (7) GRAYVILLE (White County) Hillcrest Home (13) 737 W. Wood St. 320 W. South St. DONGOLA (Union County) Keller Sheltered Care Home (27) GREENFIELD (Greene) Box 634 Hospitality House Sheltered Care (21) 212 Walnut St. DUQUOIN (Perry County) Miller Sheltered Care Home (18) GREENUP (Cumberland County) 24 S. Line St. Peters Shelter Care Home (32) 308 N. Kentucky St. DWIGHT (Livingston County) Open Arms Shelter (21) GREENVILLE (Bond County) 200 N. Franklin Hilltop House (16) 202 N. Fourth St. EAST ST. LOUIS (St. Clair County) Carr Sheltered Care Home (9) Horsfall Sheltered Care Home (52) 3112 Bond St. 201 S. Second St.

Geeding Shelter Home (16) HARDIN (Calhoun County) Hardin Sheltered Care Home (14) 139 S. Greenwood Ave. County Road St. J. C. Good Shelter Home (16) 195 N. Entrance Ave. HAVANA (Mason) Oest Sheltered Care (15) Oakland Home (16) 121 S. Pearl St. 191 N. Washington Ave. KEWANEE (Henry County) HERRIN (Williamson County) Mattingly Sheltered Care Home (19) Kewanee Manor (22) 218 S. Tremont St. 700 N. 14th St. LaHARPE (Hancock County) Park Avenue Sheltered Care Home (33) Gillett Home (7) Rt. 148, P.O. Box 68 W. Main St. HEYWORTH (McLean County) Gillett Home No. 2 (12) Lush Sheltered Care Home (15) W. Main St. 303 E. Main St. Hoosier Sheltered Care Home (15) IRVING (Montgomery County) 114 Archer Ave. Mi-Edd Shelter Home (12) LeROY (McLean County) JACKSONVILLE (Morgan County) LeRoy Home (24) Bell Sheltered Care Home (21) 902 N. Mill St. 602 Jordan St. LEXINGTON (McLean County) Blue Sheltered Care Home (6) Rose Lawn Shelter Care Home (22) 506 W. Morton Ave. 207 N. Elm St. Hardy Sheltered Care Home (14) Three Oaks Sheltered Care Home (20) 830 W. College Ave. 306 W. South St. Hoots Rest Home (16) LOUISVILLE (Clay County) 717 E. Douglas St. Twilight Haven (18) Parker Sheltered Care Home (20) Hiriam St. & Rt. 45 203 W. Beecher Ave. LOVINGTON (Moultrie County) Rosedale Sheltered Care Home (16) Gaddis Sheltered Care Home, Inc. (26) 220 Brown St. 240 E. State St. Smith-Tucker Sheltered Care Home No. 1 (26) MARION (Williamson County) 606 N. Church St. Lee Manor (30) Smith-Tucker Sheltered Care Home No. 2 (14) 1305 W. Main St. 616 N. Church St. Miner Sheltered Care Home (20) JERSEYVILLE (Jersey County) 205 E. Marion St. Alma's Shelter Care Home (26) MARSHALL (Clark County) 301 W. Pine St. Dunkel Home (20) Stark's Sheltered Care Home (20) 325 S. Sixth St. 600 N. Liberty St. Marshall Christian Hotel (34) 805 Archer Ave. JOHNSTON CITY (Williamson County) MARTINSVILLE (Clark County) Cazaleen's Sheltered Care Home (13) Glendening Home (24) 207 E. Fifth St. 25 S. Washington St. Maple House Shelter Care (23) McHENRY (McHenry County) 207 E. Third St. Shan Gra-La Sheltered Care Home (8) Maple House Sheltered Care Home No. 2 (23) 3820 W. Idyldell Rd. 205 E. 3rd St. METROPOLIS (Massac County) Nellie Ernfelt Home (31) Care Homes, Inc (33) R. R. 1 205 Metropolis St. JONESBORO (Union County) Senior Citizens Retirement Home (27) City Sheltered Care Home (14) 308 W. Third St. 201 Broad St. Gibbs Sheltered Care Home (6) MILFORD (Iroquois County) 204 S. Pecan St. Golden Jubilee Home (13) 28 S. West Ave. Henard Sheltered Care Home (15) 204 S. Main St. MINONK (Woodford County) Spurlock Shelter Care Home (35) Minonk Manor, Inc. (22) Jonesboro Square 221 Locust St. KAMPSVILLE (Calhoun County) MOLINE (Rock Island County) Smith Sheltered Care Home (12) Hendren's Sheltered Care Home (12) 2602 Sixth Ave. KANKAKEE (Kankakee County) Hensley Home (13) Bethel Shelter Home (11) 1111 Fifteenth St. 556 E. Oak St.

Paul's Boarding Home (14) 849 Fifteenth St. MORTON (Tazewell County) Morton Home (20) 424 N. Main St. MT. CARMEL (Wabash County) Chestnut Sheltered Care Home (24) 218 Chestnut Ladies Lodge (21) 318 W. Second St. Shurtleff Annex (24) 416 Plum St. Shurtleff Shelter Care Cottage (8) 429 E. Fifth St. Williamson Shelter Care Home (17) 407 W. Fourth St. MT. OLIVE (Macoupin County) Albert Sheltered Care Home (13) 101 W. Fourth St. MT. STERLING (Brown County) Mt. Sterling Sheltered Care (16) 117 E. South St. MT. VERNON (Jefferson County) Hearthside Sheltered Care Home (21) 318 N. Ninth St. MULBERRY GROVE (Bond County) Smith's Sheltered Care Home (17) 111 S. Maple St. MURPHYSBORO (Jackson County) River Bend Manor (65) 1501 Shomaker Dr. NEWTON (Jasper County) duMont Sheltered Care Home (22) 438 S. Lafayette St. OBLONG (Crawford County) Fouty's Sheltered Care Home (15) 507 S. Garfield St. Hart Sheltered Care (14) 403 N. Range St. ODELL (Livingston County) The Odell Shelter, Inc. (25) 17 Henry St. O'FALLON (St. Clair County) Andricks Shelter Care (8) 135 Main St. OLD MARISSA (St. Clair County) Old Marissa Sheltered Care Home (17) OLNEY (Richland County) Braden Sheltered Care (9) 230 E. North Ave. Colonial Manor Sheltered Care (31) 327 S. Morgan St. Marks Sunset Manor (29) 1044 Whittle Miller Sheltered Care Home (11) 103 E. Lafayette St.

OQUAWKA (Henderson County) Oguawka Shelter Home (17) PALMYRA (Macoupin County) Light House Shelter (10) PARIS (Edgar County) Colonial Home (6) 623 N. Central Ave. Hefner Shelter Care (6) 210 Chestnut St. Sanders Sheltered Care Home (11) 813 Tenbrook PAW PAW (Lee County) Pfeiffer Sheltered Care Home (10) PEKIN (Tazewell County) B. J. Perino Sheltered Care Home (54) 601-603 Prince St. PEORIA (Peoria County) Senior Citizens Sheltered Care Home (11) 302 W. Third St. Waldo Home (45) 405 N. Perry PERU (LaSalle County) Hillview Manor (12) 2106 Market St. PITTSFIELD (Pike County) Pittsfield Sheltered Care House (10) 411 W. Washington St. PLANO (Kendall County) Wesley Haven, Inc. (20) 218 N. Center PLYMOUTH (Hancock County) Thomas Sheltered Care Home (14) Box 323 PONTIAC (Livingston County) Northcrest Manor (13) 732 N. Mill St. PRINCEVILLE (Peoria County) Seven Oaks (13) Douglas and Tremont Sts. QUINCY (Adams County) Bacon Sheltered Care Home (9) 1435 N. Fifth St. Beever Sheltered Care Home (22) 327 Elm St. Frances Shelter Care Home (17) 431 Locust St. Sims Shelter House (7) 1619 N. Fourth St. ROCHELLE (Ogle County) Joyce Old Folks Home (16) 609 N. Sixth St. ROCK FALLS (Whiteside County) Riverview Haven (16) 308 E. 2nd St. ROCKFORD (Winnebago County) Bethany House (14) 412 N. Court St. Parkview Sheltered Care Home (29) 408 N. Horsman St. ROODHOUSE (Greene County)

114 E. Palm St.

Rachel Moore Shelter Care (6)

413 S. Morgan

317 N. Walnut

ONARGA (Iroquois County)

Jones Sheltered Care (11)

RUSHVILLE (Schuyler County)
Lacey's Sheltered Care Home (18)
239 W. Clay St.

ST. JACOB (Madison County)
Nolan Sheltered Care Home (25)
R.R. 1

SALEM (Marion County)
Hogge's Sheltered Care Home (19)
521 E. Church St.

SANDOVAL (Marion County)
Finn's Sheltered Care Home (18)
W. North Second St.

SAYBROOK (McLean County)
Maplebrook (15)
Main St.

SESSER (Franklin County)
Nixt Sheltered Care Home (4)
303 W. Mathew

SHELDON (Iroquois County) Sheldon Sheltered Home (44) 170 W. Concord

SIMPSON (Pope County)
Shawnee Shelter Care (14)
R.R. 2

SPARTA (Randolph County) Kirsby Shelter Home (22) 411 S. St. Louis St.

SPRINGFIELD (Sangamon County)
Gannar Cerebral Palsy Home (11)
910 S. Second St.

Lane Bryant Retirement Home (14) 1712 E. Washington St.

Peart Sheltered Care Home (21) 1010 S. Second St.

Sunshine Guest Home (16) 607 S. Fifth St.

Tomlin Retirement Home (11) 609 N. Fourth St.

STOCKTON (Jo Daviess County)
Brog's Sheltered Care Haven (13)
205 E. Benton St.

STREATOR (LaSalle County)
Hillview Sheltered Care Home (18)
518 S. Bloomington St.

SULLIVAN (Moultrie County)
Beals Sheltered Care Home (28)
13 S. McClellan St.

SYCAMORE (DeKalb County)
The Driscoll Home (15)
309 N. California

TALLULA (Menard County)
Garden View (13)
N. Ewing

TILTON (Vermilion County)
Smoot Memorial Home (8)
215 W. Sixth St.
Mrs. Etta R. Wangler Anderson
Sheltered Care Home (7)
605 E. Fifth St.

URBANA (Champaign County)
Clark Sheltered Care Home (13)
811 W. Oregon St.
Lustig Sheltered Care Home (16)
904 W. Clark St.

VANDALIA (Fayette County) Heritage House (44) Rt. 185 West

VIRGINIA (Cass County) Virginia Sheltered Care Home (18) 132 E. Illini St.

WARSAW (Hancock County)
Carlson Sheltered Care Home (22)
150 Main St.

WASHINGTON PARK (St. Clair County)
Park Retirement Home (33)
2246 N. 57th, East St. Louis

WATSEKA (Iroquois County)
Pleasant Lodge (28)
590 E. Grant St.

WAUKEGAN (Lake County)
Marseilles Retirement Home, Inc. (28)
604 N. Genesee St.

WAVERLY (Morgan County)
Witt Sheltered Care Home (18)
405 S. Miller St.

WEST FRANKFORT (Franklin County)
Peacock Sheltered Care Home (19)
309 W. Oak St.
Rankin Sheltered Care Home (6)
312 E. Fourth St.
Smith Sheltered Care Home (15)
512 S. Cherry St.
Wood Sheltered Care Home (7)

WEST SALEM (Edwards County)
Golden Acres, Inc. (33)

WHEATON (DuPage County)
Tall Tree Guest Home (16)
R.R. 1, Box 34

609 S. Monroe

WHITE HALL (Greene County)
Elliott Sheltered Care Home (14)
601 N. Main St.
Ford Sheltered Care Home (14)
535 N. Main St.
Powell Sheltered Care Home (7)
144 E. Lincoln St.
Shanahan Sheltered Care Home (10)

WINCHESTER (Scott County)
Oak Rest Sheltered Care Home (18)
206 High St.

431 Centennial St.

YORKVILLE (Kendall County) Himes Sheltered Care Home (11) 609 N. Bridge St.

ZION (Lake County) Robbins Home (9) 3220 Emmans Ave.

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HOMES FOR THE AGED

In this section, the following symbols are used: A—sheltered care facilities, B—nursing care facilities, and C—special geriatric facilities.

ALHAMBRA (Madison County) George J. Goldman Memorial Home for the Hitz Memorial Home—(AB-25) Jewish Aged—(AB-37) Belle St. 1152 W. Farwell Ave. Home for the Association of Jewish Blind-ALTON (Madison County) The Loretto Home—(A-60) (A-43)417 Prospect St. 3525 W. Foster Ave. ARLINGTON HEIGHTS (Cook County) Jane Dent Home—(A-22) Lutheran Home and Service for the Aged-4430-32 Vincennes Ave. (AB-203) Jewish Home for the Aged—(ABC-286) 800 W. Oakton St. 1648 S. Albany Ave. AURORA (Kane County) Methodist Old Peoples Home—(AB-191) Jennings Terrace—(AB-106) 1415 Foster Ave. 275 S. LaSalle St. Northwest Home for the Aged—(AB-52) Sunnymere, Inc.—(AB-48) 2201 N. Sacramento Ave. 925 Sixth Ave. Norwegian Lutheran Bethesda Home-BELLEVILLE (St. Clair County) (AB-150) Meredith Memorial Home—(A-85) 2833 N. Nordica Ave. Public Square Norwood Park Home—(AB-140) St. Paul's Home—(AB-98) 6016 N. Nina Ave. 1021 W. "E" St. The Old People's Home of the City of BENSENVILLE (DuPage County) Chicago—(AB-125) Bensenville Home Society—(AB-120) 909 Foster Ave. York and Memorial Dr. Park View Home—(ABC-142) BROOKFIELD (Cook County) 1401 N. California Ave. Sacred Heart Home—(AB-200) The British Home—(AB-90) 31st and McCormick Ave. 1550 S. Albany Ave. CANTON (Fulton County) St. Augustine—(AB-162) Nancy and Ann Kelley Home for the 2358 N. Sheffield Ave. Aged—(A-10) St. Joseph's Home for the Aged—(AB-178) 344 W. Chestnut St. 2650 N. Ridgeway Ave. CARLYLE (Clinton County) St. Paul's House—(A-70) St. Mary's Home for the Aged—(A-42) 3831 N. Mozart St. 501 Clinton St. Selfhelp Home for the Aged—(AB-42) CHAMPAIGN (Champaign County) 4941 S. Drexel Blvd. The Garwood Home—(A-29) Society for the Danish Old People's Home-1515 N. Market St. (AB-89) CHESTER (Randolph County) 5656 N. Newcastle Ave. St. Ann's Home—(AB-45) Washington and Jane Smith Home—(ABC-190) 770 State St. 2340 W. 113th Pl. CHICAGO (Cook County) DANVILLE (Vermilion County) Augustana Home for the Aged—(AB-140) Webster Memorial Home—(A-11) 7540 Stony Island Ave. 903 N. Logan Ave. Bethany Home—(AB-415) ELBURN (Kane County) 5015 N. Paulina St. Fellowship Deaconry—(A-11) Bohemian Home for the Aged-(AB-150) 526 N. Main St. 5061 N. Pulaski Rd. ELGIN (Kane County) Chicago Holland Home for the Aged—(A-140) Oak Crest Residence—(AB-43) 240 W. 107th Pl. 204 S. State St. Church Home for Aged Persons—(AB-90) EUREKA (Woodford County) 5435-45 Ingleside Ave. Apostolic Christian Home at Eureka-Cosmopolitan Community Home—(A-25) (AB-48) 51 E. 53rd St. 610 W. Cruger St. Covenant Home—(AB-101) Maple Lawn Homes—(AB-96) 2725 W. Foster Ave. Box 37, R.R. 2 Drexel Home, Inc.—(ABC-230) EVANSTON (Cook County)

6140 Drexel Ave.

1140 S. Bell Ave.

Fridhem Baptist Home—(AB-95)

Alonzo Mather Aged Ladies Home-

(AB-203)

1615 Hinman Ave.

JUSTICE (Cook County) The Georgian, Division of Methodist Old Peoples Home—(AB-245) Rosary Hill Convalescent Home—(AB-75) 422 Davis St. 9000 W. 81st St. Homecrest Foundation—(A-50) KEWANEE (Henry County) 1430 Chicago Ave. St. Bernadette Manor—(A-24) Elliott St. James C. King Home for Old Men-The Whiting Home—(A-10) (AB-84)1555 Oak Ave. 320 S. Chestnut St. Lake Crest Villa—(A-32) KNOXVILLE (Knox County) Illinois P.E.O. Home—(A-35) 2601 Central St. 415 E. Main St. Pioneer Place—(AB-113) LaGRANGE PARK (Cook County) 2320 Pioneer Rd. Plymouth Place—(AB-182) Presbyterian Home—(AB-303) 3200 Grant St. 315 N. LaGrange Rd. LAKE VILLA (Lake County) FAIRBURY (Livingston County) Fairview Haven, Inc.—(AB-43) American Aid and Old Peoples Home 605-609 N. Fourth Society—(A-18) FOREST PARK (Cook County) Grand Ave. Altenheim (German Old Peoples Home)-LAWRENCEVILLE (Lawrence County) (AB-250) The Methodist Home—(AB-143) 7824 Madison St. 1601 S. Sixteenth St. FREEPORT (Stephenson County) LEMONT (Cook County) Freeport-Bensenville Home—(A-20) Holy Family Villa—(AB-112) 822 W. Stephenson St. 123rd St. Park View Home—(A-25) Mother Theresa Home-(AB-54) South Park Blvd. 1270 Main St. St. Joseph Home for the Aged—(AB-116) LINCOLN (Logan County) Deaconess Memorial Home Annex—(A-20) 649 E. Jefferson St. GIRARD (Macoupin County) 315 Eighth St. The Home—(A-48) MACOMB (McDonough County) Everly House—(A-38) GLENVIEW (Cook County) Maryhaven Village for Aged and Blind-811 S. Lafayette St. MACON (Macon County) (AB-166)1700 E. Lake Ave. Eastern Star Home at Macon—(AB-111) GOLDEN (Adams County) MATTOON (Coles County) Golden Good Shepherd Home, Inc.—(AB-48) Illinois I.O.O.F. Old Folk's Home—(AB-225) GURNEE (Lake County) E. Lafayette St. Independent Order of Vikings Home for MAYWOOD (Cook County) Aged Members—(AB-35) Maywood Baptist Home—(AB-229) Grand Ave. 316 Randolph St. HIGHLAND (Madison County) Maywood Home for Soldiers Widows—(A-32) 224 N. First Ave. Highland Home—(A-27) MEADOWS (McLean County) 1600 Walnut St. Meadows Mennonite Home—(AB-58) HIGHLAND PARK (Lake County) Villa St. Cyril—(AB-82) MENDOTA (LaSalle County) Mendota Lutheran Home—(AB-42) 1111 St. Johns Ave. 504 Sixth St. HINSDALE (Cook County) MORRISON (Whiteside County) King-Bruwaert House—(AB-79) 6101 County Line Rd. Resthaven Home of Whiteside County—(A-23) Maple Ave. HINSDALE (DuPage County) MORTON GROVE (Cook County) Godair Home—(AB-53) 6259 S. Madison St. Bethany Terrace Retirement and Nursing Home—(AB-137) JACKSONVILLE (Morgan County) 8425 N. Waukegan Rd. Illinois Christian Home, Inc.—(AB-110) MT. CARROLL (Carroll County) 873 Grove St. JOLIET (Will County) Caroline Mark Home—(A-16) 222 E. Lincoln St. Our Lady of Angels Retirement Home-MT. MORRIS (Ogle County) (AB-100)1201 Wyoming Ave. Pinecrest Manor—(AB-122) St. Patrick Retirement Hotel—(AB-203) 414 S. McKendrie Ave. 22 E. Clinton St. NEW ATHENS (St. Clair County) Salem Home for the Aged—(AB-82) New Athens Home—(AB-36) 1313 Rowell Ave. 203 S. Johnson St.

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NILES (Cook County)

St. Andrew Home for the Aged—(AB-225)

7000 N. Newark Ave.

St. Benedict's Home for the Aged—(AB-52) 6930 W. Touhy Ave.

NORMAL (McLean County)

Shamel Manor—(A-100)

509 N. Adelaide

NORRIDGE (Cook County)

Central Baptist Home for the Aged—(AB-94) 7901 W. Lawrence Ave.

NORTHLAKE (Cook County)

Villa Scalabrini—(AB-88)

Wolf Rd. and Palmer St.

NORTH RIVERSIDE (Cook County)

Scottish Old Peoples Home—(AB-50)

28th St. and DesPlaines Rd.

OTTAWA (LaSalle County)

Cora J. Pope Home—(A-14)

116 W. Prospect St.

Pleasant View Luther Home—(AB-146) 505 College Ave.

PALATINE (Cook County)

St. Joseph's Home for the Elderly (AB-250)

PARK RIDGE (Cook County)

St. Matthew Lutheran Home—(AB-90)

1601 N. Western Ave.

PAXTON (Ford County)

Illinois Knight Templar Home for the

Aged Infirm—(B-29)

706 S. Washington St.

PEORIA (Peoria County)

Apostolic Christian Home—(A-32)

7023 Skyline Dr.

Christian Buehler Memorial Home—(AB-223)

3415 N. Sheridan Rd.

Guyer Memorial Home—(A-18)

201 W. Columbia Terr.

John C. Proctor Endowment Home—(AB-224)

1301 N.E. Glendale Ave.

St. Joseph's Home for the Aged—(AB-200)

2223 W. Heading Ave.

PEOTONE (Will County)

Peotone Bensenville Home—(AB-29)

Wood and West Sts.

PONTIAC (Livingston County)

Evenglow Lodge—(A-151)

201 E. Washington St.

Humiston Haven—(AB-74)

300 W. Lowell St.

PRINCETON (Bureau County)

Adeline E. Prouty Home—(A-8)

508 Park Ave. East

QUINCY (Adams County)

Anna Brown Home for the Aged—(AB-35)

1507 N. Fifth St.

Good Samaritan Home—(AB-110)

2130 Harrison St.

Methodist Sunset Home—(AB-144)

418 Washington St.

St. Vincent's Home-(A-130)

1340 N. Tenth St.

ROCKFORD (Winnebago County)

Eastern Star Home of Rockford—(AB-100)

2400 S. Main St.

P. A. Peterson Home—(AB-25)

1301 Parkview Ave.

Wesley Willows, a Methodist Retirement

Home—(AB-228)

4141 N. Rockton Ave.

Winnebago Home for the Aged—(AB-39)

Box 2, Safford Rd.

ROCK ISLAND (Rock Island County)

Cleveland Home for the King's Daughters

of Illinois, Inc.—(A-23)

805 Nineteenth St.

Huber Memorial Home—(A-23)

1000-30th St.

SPRINGFIELD (Sangamon County)

Carrie Post King's Daughters Home

for Women—(A-38)

541 Black Ave.

Illinois Presbyterian Home—(A-61)

W. Lawrence at Chatham Rd.

Mary Bryant Home for the Blind-(A-48)

1100 S. Fifth St.

St. Joseph's Home for the Aged—(A-125)

S. Sixth Street Rd.

SULLIVAN (Moultrie County)

Illinois Masonic Home—(AB-310)

Rt. 121E

Titus Memorial Presbyterian Home—(A-11)

513 N. Worth St.

TECHNY (Cook County)

St. Ann's Home and Infirmary—(AB-200)

Waukegan Rd.

VIRDEN (Macoupin County)

Mothers' Memorial Baptist Home—(AB-27)

402 W. Loud St.

WHEELING (Cook County)

Addolorata Villa—(AB-112)

Hwy. 83, McHenry Rd.

WILMETTE (Cook County)

Baha'i Home—(A-20)

401 Greenleaf Ave.

Maryhaven, Inc.—(AB-113)

2228 Beechwood Ave.

WOODSTOCK (McHenry County)

Sunset Manor, Inc.—(AB-54)

920 Seminary Ave.

EXTENDED CARE FACILITIES

The facilities listed below have been surveyed by the Illinois Department of Public Health and certified by the U.S. Department of Health, Education, and Welfare as Extended Care Facilities for Medicare beneficiaries, as of Sept. 27, 1967. The number of certified beds within the facility is indicated.

ABINGDON

Abingdon Nursing Home (74)

ALTON

Eunice E. Smith (64)

ANNA

Union County Hospital (19)

ARTHUR

Arthur Home (42)

AUBURN

Parks Nursing Home (54)

AURORA

Borealis Nursing Home (112)

St. Charles Hospital (26)

AVON

Avon Nursing Home, Inc. (48)

BELLEVILLE

Memorial Nursing Home (111)

St. Elizabeth's Home (54)

BENTON

Franklin Hospital Skilled Nursing (81)

BERWYN

Fairfax Ger. & Conv. Center (106)

R N Convalescent Home (49)

BLOOMINGTON

Heritage Manor, Inc. (86)

CARBONDALE

Styrest Nursing Home (54)

CASEY

Casey Nursing Home (92)

CENTRALIA

Centralia Fireside House (46)

CHAMPAIGN Americana Nursing Center (100)

CHARLESTON

Hilltop Nursing Home (72)

CHESTER

St. Ann's Home (45)

CHICAGO

All American Nursing Home (144)

Alshore House (53)

Augustana Home for Aged (28)

Austin Congress Nursing Home (136)

Bethany Methodist Hosp. Ger. Div. (87)

Bryn Mawr House, Inc. (183)

Carmen Manor (144)

Dearborn House (128)

Drexel Home (245)

Elston Home (122)

Fargo Beach Home (143)

Fountainebleau Manor (30)

Vincennes Manor (110)

Fox River Rehab. Center (74)

Garden View Home (130)

Jewish Home for Aged (232)

Johnson Rehab. Nursing Home (76)

Kostner Manor (119)

Melbourne Convalescent Home (170)

Montgomery Convalescent Home (80)

Northwest Home for Aged (50)

Park Nursing Home (85)

Park View Home (31)

Rosewood Terrace (32)

South Shore Kosher Rest Home (90)

South Shore Pavilion (113)

Sovereign Home (55)

Wellington Plaza (91)

Westwood Manor (115)

Wrightwood Nursing Home (90)

CHICAGO HEIGHTS

Suburban Convalescent Home (49)

CHILLICOTHE CHILLICOTHE

Park Hill Nursing Home (66)

COAL VALLEY

Oak Glen Nursing Home (286)

DECATUR

Americana Nursing Center (65)

Lakeshore Manor (76)

DEKALB

DeKalb Public Hospital (14)

Pine Acres Retirement Center (60)

DESPLAINES

Brookwood Convalescent Center (111)

Golf Road Pavilion Nursing Home (142)

DIXON

Orchards Glen (54)

DUQUOIN

Fair Acres Nursing Home (74)

ELMHURST

Elmhurst Nursing Home (42)

ELGIN

Simpson House (46)

EVANSTON

Dobson Plaza Nursing Home (52)

Three Oaks Nursing Center (124)

Presbyterian Home (75)

EVERGREEN

Evergreen Gardens (40)

Peace Memorial Home (160)

FULTON

Harbor Crest Home (49)

GALESBURG

Americana Nursing Center (67)

GODFREY

Flu-Fountain Manor (75)

GENESEE

Hammond Henry Dist. Hospital (48)

GLENVIEW

Golf Mill Nursing Home (166)

HIGHLAND PARK

Villa St. Cyril (13)

HIGHWOOD

Pavilion of Highwood (59)

HILLSIDE

Oakridge Convalescent Home (16)

HOPEDALE

Hopedale Nursing Home (86)

JACKSONVILLE

Modern Care Conv. & Nsg. Home (40)

JOLIET

Americana Nursing Center (89)

Salem Home for Aged (26)

Our Lady of Angels Ret. Home (22)

St. Patricks Residence (20)

KANKAKEE

Americana Nursing Center (92)

Riverside Hospital (50)

KEWANEE

Spoon River Residence (41)

LACON

St. Joseph Nursing Home (50)

LAGRANGE

LaGrange Colonial Manor & Conv. N.C. (21)

LAWRENCEVILLE

The Methodist Home of Aged (40)

LEWISTON

Claratona Manor (25)

LIVERTYVILLE

Lake County Nursing Home (153)

LINCOLN

Abraham Lincoln Mem. Ext. Care (53)

Christian Nursing Home (48)

Mary Henry Nursing Home (52)

LITCHFIELD

Litchfield Nursing Home (48)

LOVES PARK Fountain Terrace Nsg. Home (49)

MACOMB

Americana Nursing Center (56)

MARSHALL

Burnside Nursing Home (87)

MATTOON

Douglas Nursing Center (49)

MENDOTA

Sunrise Nursing Home (49)

MOLINE

Americana Nursing Center (67)

MORTON

Restmor (58)

MT. MORRIS

Pinecrest Manor (122)

MT. VERNON

Good Samaritan Hosp. ECF (20)

Hickory Grove Manor (99)

MT. ZION

Woodland Nursing Center (70)

MUNDELEIN

Riverwood Rehab. Center (65)

NAPERVILLE

Americana Nursing Center (95)

NEWTON

Newton Rest Haven (29)

NILES

Pleasantview Con. & Nsg. Ctr. (91)

NORMAL

Americana Nursing Center (95)

NORTHBROOK

Eden View and Geriatric (142)

OAK FOREST

Oak Forrest Hospital (1393)

OAK LAWN

Monticello Convalescent Ctr. (99)

Oak Lawn Convalescent & Ger. (38)

Parkside Gardens Nsg. Home (77)

O'FALLON

Parkview Colonial Manor (107)

OLNEY

Burgin Nursing Manor (26)

OTTAWA

Highland San. & Conv. Home (63)

Pleasant View Luther Home (54)

PARK RIDGE

St. Matthew Lutheran Home (29)

PEKIN

Pekin Mem. Hosp. Ext. Care (39)

PEORIA

Americana Nursing Center (65)

Fireside House (108)

High View Nursing Home (66)

Heritage Manor Nsg. & Conv. Home (55)

PERU

Heritage Manor (55)

PETERSBURG

Menard Convalescent Center (54)

PONTIAC

Evenglow Lodge (40)

Humiston Haven (20)

OUINCY

Lincoln Terrace Nursing Home (84)

Methodist Sunset Home (64)

St. Joseph Hall (72)

ROBBINS

Esma A. Wright Conv. Center (50)

ROCHELL

Americana Nursing Center (49)

ROCK FALLS

Colonial Acres Rest Home (55)

ROCKFORD

Alma Nelson Manor (36) Americana Nursing Center (114)

Riverside Manor (108)

Wesley Willows (30)

ROSICLARE

Hardin County General Hosp. (4)

SALEM

Twin Willows Nursing Center (74)

SHELBYVILLE

Shelby County Mem. Hospital (20)

SKOKIE

Old Orchard Manor (61)

Village Nursing Home (128)

SPRINGFIELD

Americana Nursing Center (114)

Everett McKinley Dirksen Home (72)

Rutledge Manor Care Home (46)

STERLING

Colonial Acres Rest Home (70)

STREATOR

Heritage Manor (57)

SULLIVAN

East View Nursing Home (52)

TAYLORVILLE

Meadow Manor (36)

TECHNY

St. Ann's Home & Infirmary (35)

URBANA

Fontana Nursing Care Center (47)

WATSEKA

Iroquois Resident Home (58)

WASHINGTON

Washington Nursing Center (51)

WATERLOO

Monroe County Nursing Home (182)

WAUKEGAN

The Terrace Nursing Home (112)

Waukegan Pavilion Nursing Home (96)

WINFIELD

Abbey-Winfield Geriatric C. H. (48)

WHEATON

DuPage Convalescent Home (28)

INDEPENDENT LABORATORIES

The Independent Laboratories listed below have been surveyed by the Illinois Department of Public Health and certified by the U.S. Department of Health, Education and Welfare as providers of service for Medicare beneficiaries as of Sept. 27, 1967. The specific tests reimbursable by Medicare are indicated in parentheses following the name of each laboratory:

- a. Microbiology
- b. Serology
- c. Clinical Chemistry
- d. Hematology

- e. Immunohematology
- f. Tissue Pathology
- g. Exfoliative Cytology
- h. All Clinical

ARGO

Argo Clinical Lab. (BCD) 143 S. Lincoln, 60505

ARLINGTON HEIGHTS

Arlington Medical Lab. (ACDE) 1430 N. Arlington Heights Rd., 60004 Village Medical Lab., (CDE) 1009 S. Evergreen, 60005

AURORA Clinical Lab. (H) 143 S. Lincoln, 60505

BARRINGTON

Barrington Medical Lab. (ABCD) 606 S. Northwest Hwy., 60010

BELLEVILLE

St. Clair Medical Lab. (ABCDFG) 301 W. Lincoln, 62220

BERWYN

Medica Clinical Lab. (ABD) 3340 S. Oak Park Ave., 60403

BLOOMINGTON

Bloomington Cornbelt Biochmel. Lab. (ABCD) 705 North East, 61701 Hans H. Stroink, M.D. (H) 214 Unity Bldg., 61701

BROADVIEW

Broadview Physicians Lab. (ABCDE) 220 W. Roosevelt, 60155

CHAMPAIGN

Doctors Bldg. Lab., (CDE) 301 E. Springfield, 61820

CHICAGO

Avenue Medical Lab. (ABCD) 5959 N. Washtenaw, 60645

A & D Medical Lab. (ACDE) 3848 W. 63rd St., 60629

Almar Clinical Lab. (ABD) 2457 W. Peterson Ave., 60645

Anderson Clinical Lab. (D) 811 Wellington, 60657

Aquinas Medical Lab. (C) 11102 S. Artesian Ave., 60655

Arcade Clinical Lab. (ACDE) 6355 Broadway, 60626

Associated Medical Lab., Inc. (ABCDE) 4753 Broadway, 60640

Austin Clinical Lab. (D) 5679 W. Madison St., 60644

Avenue Medical Lab. (ABCD) 11318 S. Michigan Ave., 60628

Bel-View Clinical Lab. (BCDE) 6157 W. Belmont Ave., 60634

Beverly-Sheridan Labs., Inc., (BCD) 9449½ S. Ashland, 60620

Bravermans Medical Lab. (BCD) 2549 W. Lawrence, 60625 Brooks Clinical Lab. (ACDE) 4006 Milwaukee Ave., 60641

A. S. Cahan, M.D. (ACDE) 4010 W. Madison St., 60624

Central X-Ray & Clinical Lab. (H) 111 N. Wabash, 60602

Chathan-Avalon Clinical Lab. (ABCDE) 8222 S. Parkway, 60619

Clearing Clinic, Inc. (ABCD) 5548 W. 65th St., 60638

Colonial Medical Lab. (ABCD) 2024 W. 79th St., 60620

Doctors Medical Lab., Inc. (ABD) 11450 S. Michigan Ave., 60628

Foster-Western Clinical Lab. (ABCDE) 5214 N. Western Ave., 60625

Gerber X-Ray & Clinical Lab. (ABCDE) 2400 W. Devon, 60645

Gerson Clinical Lab. (ACD) 1 N. Pulaski Rd., 60624

Highland Medical Labs. (ABCD) 7922 S. Ashland Ave., 60620

Hilltop Testing Lab. (CD) 1321 W. 87th St., 60620

Humbolt Clinical Lab. (D) 2018 S. Ashland, 60608

Hyde Park Medical Lab. (BCDG) 5420 S. Harper, 60615

K & K Clinical Lab., Inc. (D) 5935 W. Addison, 60634

Kendon Medical Lab., Inc. (ABCD) 8625 S. Cicero, 60652

Letho Clinical Labs. (H) 1325 S. Racine, 60608

Marquette Medical Lab. (ABCD) 6132 S. Kedzie, 60629

Mart X-Ray Lab., Co. (ACD) 7-110 Merchandise Mt., 60654

Maryhaven Medical Lab., Inc. (CD) 8700 S. Dante, 60619

Drs. Mason & Barron (H) 2056 N. Clark St., 60614

Medical Associates of Chicago (H) 3233 South Parkway, 60616

Medical Center Clinical Labs. (CD) 3528 N. Ashland, 60657

Metro Lab. (H) 1737 W. Howard, 60626 Metro Lab. (H)
30 N. Michigan Ave., 60602

Metro Lab. (H) 2376 E. 71st St., 60649

Michael Reese Research Foundation (BDE) 530 E. 31st St., 60616

Midwest Cytology Lab. (G) 5707 N. Ashland Ave., 60626

Molay Medical Labs. (ABCD) 185 N. Wabash, 60601

Meyman Lab. (C) 55 E. Washington, 60602

North Beverly Clinical Lab. (BCDE) 1700 W. 87th St., 60620

North-Kimball Medical Labs. (BCDE) 1579 N. Milwaukee, 60622

Parkview Home (ABCD) 1401 N. California, 60622

Parkway Labs. (CDE) 408 E. Marquette Rd., 60637

Pathology Associates (H) 55 E. Washington, 60602

Peterson-Western X-Ray Lab. (ABCDE) 2424 W. Peterson Ave., 60645

P M D Clinical Lab. (ABCD) 2017 W. 95 St., 60643

Physicians & Surgeons Cl. Lab. (ABCDE) 6710 W. North Ave., 60635

S & S Medical Lab. (CD) 532 E. 47 St., 60653

Sarian Medical Labs. (ABCDE) 6257 S. Archer, 60638

Sauganash Medical & X-Ray Lab. (ABCD) 4833 W. Peterson, 60646

South East Medical Lab. (CD) 1832 E 87 St., 60617

South Central Medical Lab. (ABCD) 5050 S. State St., 60609

Thornburg Clinical Lab. (ABCDE) 720 No. Michigan, 60611

200 Clinical Lab. (BCDE) 200 E. 75 St., 60619

2011 Clinical Lab. (CD) 2011 E. 75 St., 60649

United Medical Lab., Inc. (ABCDEG) 5 So. Wabash, 60603

University Lab. (ABCDE) 5 So. Wabash, 60603

West Lawn Medical Lab. (ABCD) 4255 W. 63 St., 60629

Westerly Medical Lab. (ABCDE) 10404 S. Western, 60643

Westridge Clinical Lab. (ABCD) 6450 N. California, 60645

Westside Clinical Lab. (CD) 3808 W. Roosevelt Rd., 60624

Zietlin X-Ray & Clinical Lab. (CDE) 2800 N. Milwaukee, 60618

CICERO

Suburban Labs., Inc. (ABCD) 2137 S. Lombard, 60650

DECATUR

Central Clinical Lab. (ABCDE) 1314 N. Main, 62526

DEERFIELD

Colrad Clinical Labs. (ABCD) 747 Deerfield Rd., 60015

DEKALB

De Graffenried & Fisher Cl. Lab. (H) 1838 Sycamore Rd., 60115

DES PLAINES

De Ridge Clinical Lab. (ABCDE) 3200 Dempster, 60016

DIXON

Physicians Medical Lab. (ABCD) 101 First St., 61021

EAST ST. LOUIS

Clinical Lab. (ABCDE) 4601 State St., 62201

ELGIN

Fox Valley Medical Lab. (H) 860 E. Summit, 60120

ELMHURST

Haven Clinical Lab. (ABCD) 103 Haven Rd., 60126

Sandahl Medical Labs. (BCDE) 135 S. Kenilworth, 60126

EVANSTON

COS Building Lab. (H) 2500 Ridge Ave., 60201

Gyne Cytology Lab., Inc. (G) 636 Church St., 60201

Pathology Associates (H) 636 Church St., 60201

EVERGREEN PARK

Anatomic & Cl. Pathology Lab. (G) P. O. Box 919, 60642

FOREST PARK

Bowers Lab. (ABCDE) 7450 Jackson Blvd., 60130

FRANKLIN PARK

Franklin Park Medical Lab. (CDEG) 9711 Grand, 60131

GALESBURG

Galesburg Clinic Lab. (ABCD) 320 N. Kellogg, 61401

Medical Lab. (H) 628 Bondi Bldg., 61401

GLENVIEW

NW Sub X-Ray & Clinical Lab. (ABCDE) 924 Waukegan, 60025

HARVEY

Graham Clinical Lab. (B) 468 E. 147 St., 60426

HIGHLAND PARK

Highland Park Medical Lab. (ABCDE) 1950 Sheridan Rd., 60035

HINSDALE

Pathology Associates (H) 40 S. Clay, 60521

HOFFMAN ESTS.

Twinbrook Medical Lab., Inc. (ABD) Golf & Roselle Rds., 60172

JOLIET

Central Lab. (ABCE) 57 W. Jefferson St., 60431

Doctors Clinical Lab. (ABCE) 330 N. Madison St., 60435

Osler Labs., Inc. (ABCDE) 120 No. Scott St., 60431

Prescription Shop Lab., (ABCE) 56 N. Chicago, 60431

Woodruff Lab., Inc. (ABCD) 250 N. Ottawa St., 60431

KANKAKEE

Medical Center Lab. (ABCDE) 1309 E. Court, 60901

LA GRANGE

La Grange Medical Building Lab. (CD) 47 So. Sixth Ave., 60525

LANSING

De Graff Clinical Lab. (ABCDE) 3341 Ridge Rd., 60438

LA SALLE

Medical Lab. (BCDE) 555 2nd St., 61301

MAYWOOD

Josyln Clinic Lab. (ABCDE) 1908 St. Charles Rd., 60153

McHENRY

McHenry Medical Group (H) 1110 N. Green St., 60050

MELROSE PARK

Broadway Lab., Inc. (ABCD) 1812 N. Broadway, 60160

MOLINE

Martin Clinical Lab. (H) 1520 7th St., 61265

MORTON GROVE

Morton Gr. X-Ray & Clinical Lab. (ABCD) 6032 Lincoln Ave., 60053

Sommerfeld Med. Lab. (ABCD) 5818 Dempster St., 60003

MOUNT PROSPECT

Mt. Prospect Clinical Lab. (C) 321 W. Prospect, 60056

Prospect Clinical Lab. (ABCD) 1060 W. Northwest Hwy, 60056

NORTH BROOK

Northbrook Cl. & X-Ray Labs. (ABCD) 1775 Walters, 60062

OAK BROOK

Pathology Associates (H) 120 Oak Brook Ctr. Ml., 60521

OAK PARK

American Medical Lab. (ABCD) 6441 W. North Ave., 60302

James B. Hartney, MD (FG) 410 Lake St., 60302

Hill Clinical Lab. (H) 1011 Lake St., 60301

No. Riverside Medical Lab., Inc. (ABCDE) 1159 Westgate, 60301

Twin Oaks Lab. (ABCDE) 101 W. Madison St., 60304

OGLESBY

Physicians Clinical Lab. (CD) 338 E. Walnut St., 61348

PALOS HEIGHTS

Palos Medical Lab. (ABCDE) 12150 S. Harlem, 60463

PEKIN

The Medical Lab. (AD) 519 Margaret, 61554

PEORIA

M B Clinical Lab. (ABCDE) 818 Main Street, 61606

Medical Center Labs. (H) 416 St. Marks Ct., 61603

Wm. Schwarzendruber Lab. (ABCD) 300 E. War Mem. Dr., 61614

ROCKFORD

Medical Labs. of Pathology (H) 1221 E. State St., 61108

SKOKIE

Dempster Street Pathology Lab. (H) 4240 Dempster, 60076

Lincoln Medical Lab. (CD) 4535 Oakton, 60076

North Sub. Clinical Lab. (ABCDE) 4801 Church St., 60076

SPRINGFIELD

Capitol Clinical Labs. (ACD) 1104 S. Second, 62704

Doctors Park Medical Lab. (CD) 701 N. Walnut, 62702

Physicians Medical Lab. (ABCDE) 501 N. 6th St., 62705

WAUKEGAN

Besley-Waukegan Clinic (ABCDE) 215 N. Sheridan Rd., 60085

Physicians & Surgeons Lab. (H) 1616 W. Grand, 60085

WHEATON

Drs. Mason & Barron (H) 303 Naperville Rd., 60187

WILMETTE

Wilmette Clinical Lab. (H) 165 Green Bay Rd., 60091

WINNETKA

Clini-Tech Labs., Inc. (ABCD) 1048 Gage St., 60093

Winnetka Clinical Lab. (ABCD) 725 Elm St., 60093

ZION

Zion Clinic Lab. (CDE) 2629 Sheridan Rd., 60099

HOME HEALTH AGENCIES CERTIFIED UNDER TITLE 18 (MEDICARE) AS OF JULY 19, 1967

In addition to providing skilled nursing service, Home Health Agencies are certified for providing the following specific secondary services:

M.S.S.—Medical Social Services
SP.T. —Speech Therapy
P.T. —Physical Therapy
O.T. —Occupational Therapy
H.H.A.—Home Health Aide Service

ALEDO

Mercer County Health Department Court House, Aledo 61231 P.O.—O.T.—Sp.T.

ALTON

Family Service and Visiting Nurse Assn. 211 E. Broadway, Alton 62002 M.S.S.

AURORA

Visiting Nurse Association of Aurora 52 W. Downer Pl., Aurora 60506 Sp.T.

BELLWOOD

Community Nursing Service of Proviso Township 233 Mannheim Rd., Bellwood 60104 P.T.

CAIRO

Tri County Health Department 1115 Cedar St., Cairo 62914 Sp.T.

CAMBRIDGE

Henry County Health Department Court House Annex, Cambridge 61238 P.T.

CANTON

Fulton County Health Department 31 S. Main St., Canton 61520 P.T.

CHAMPAIGN

Champaign-Urbana Public Health District 505 S. Fifth St., Champaign 61820 P.T.

CHARLESTON

Charleston Community Memorial Hospital Rte. 130, Charleston 61920 P.T.

CHICAGO

Alverna Home Nursing Center
1437 W. 51st St., Chicago 60609
P.T.
Visiting Nurse Association of Chicago
5 S. Wabash Ave., Chicago 60603
P.T.—Sp. T.—H.H.A.

Park View Home 1401 N. California Ave., Chicago 60622 P.T.—Sp.T.—O.T.—M.S.S. Michael Reese Hospital & Medical Center 2839 S. Ellis Ave., Chicago 60616 P.T.—O.T.—M.S.S. Cook County Department of Public Health 1425 S. Racine Ave., Chicago 60608 P.T. Drexel Home, Inc. 6140 S. Drexel Ave., Chicago 60637 P.T.—Sp.T.—O.T.—M.S.S.—H.H.A. Jewish Home for the Aged 1648 S. Albany Ave., Chicago 60623 P.T.—O.T.—M.S.S.—H.H.A. Mt. Sinai Hospital Medical Center California Ave. at 15th St., Chicago 60608

CLINTON

DeWitt-Piatt County Health Department 122 E. Main St., Clinton 61727 Sp.T.

P.T.—Sp.T.—O.T.—M.S.S.

DANVILLE

Child Welfare and Visiting Nurse Association 402 N. Hazel St., Danville 61832 M.S.S. Vermillion County Health Department

808 N. Logan Ave., Danville
M.S.S.

DECATUR

Visiting Nurse Association of Macon County 919 N. Water St., Decatur 62523 P.T.

DeKALB

DeKalb County Health Department 1731 Sycamore Rd., DeKalb 60115 P.T.

DES PLAINES

City of Des Plaines, Dept. of Public Health City Hall, Graceland and Miner, Des Plaines 60016 P.T.

DIXON

Lee County Health Department 316 W. Third St., Dixon 61021 P.T.—Sp.T.

EAST MOLINE

East Moline Visiting Nurse Association 915—16th Ave., East Moline 61244 P.T.—Sp.T.—O.T.

EAST ST. LOUIS

Visiting Nurse Assoc. of St. Clair County 4601 State St., Room 305, East St. Louis 62205 P.T.—O.T.

for October, 1967 539

EFFINGHAM

Effington County Health Department 112 Section Ave., Effingham 62401 P.T.—Sp.T.

ELDORADO

Egyptian Health Department 1333 Locust St., Eldorado 62930 Sp.T.

ELGIN

Elgin Health Center 370 E. Chicago St., Elgin 60120 P.T.

EVANSTON

Visiting Nurse Association of Evanston 828 Davis St., Evanston 60201 P.T.

FREEPORT

Stephenson County Health Dept.
Court House—W. Stephenson St., Freeport 61032
Sp.T.
Visiting Nurse Assoc. of the Amity Societies

7 N. State St., Freeport

P.T.

GALENA

Jo Daviess County Health Department 311 S. Main St., Galena 61036 P.T.

GOLCONDA

Quadri-County Health Department Golconda 62938 P.T.

GREENVILLE

Bond County Health Department 100 N. Locust St., Greenville 62246 Sp.T.

HARDIN

Calhoun County Health Department Sweeney Professional Bldg., Hardin 62047 P.T.

HIGHLAND PARK

Visiting Nurse Association of Deerfield 718 Glenview Ave., Highland Park 60036 P.T.

JACKSONVILLE

Visiting Nurses Association of Morgan County 234½ W. State St., Jacksonville 62650 P.T.

JERSEYVILLE

Jersey County Health Department Courthouse P.O. Box 69, Jerseyville P.T.

JOHNSTON CITY

Bi-County Health Department 217 E. Broadway, Johnston City 62951 P.T.

JOLIET

Public Health Council 102½ E. Van Buren St., Joliet 60432 P.T. Will County Health Department 21 E. Van Buren, Joliet 60435 P.T.

LaSALLE

Hygienic Institute
151 Fifth St., LaSalle 61301
P.T.

LAKE FOREST

Lake Forest Hospital 660 N. Westmoreland Rd., Lake Forest 60045 P.T.

LAWRENCEVILLE

Lawrence County Health Department Court House, Lawrenceville 62439 P.T.

LINCOLN

Abraham Lincoln Memorial Home Health Serv. 315 Eighth St., Lincoln 62656 P.T.—O.T.—Sp.T.

MARSEILLES

Marseilles Nursing Service 227 S. Main St., Marseilles 61341 P.T.

McHENRY

McHenry County Health Department 605 N. Green St., Woodstock 60050 P.T.

MOLINE

Moline Visiting Nurse Association 1409—7 Ave., Moline 61265 P.T.—O.T.—Sp.T.

MORRIS

Grundy County Health Department Court House, Morris 60450 Sp.T.

MOUNT CARROLL

Carroll County Health Department Mount Carroll 61053 P.T.

MURPHYSBORO

Jackson County Health Department 1015½ Chestnut St., Murphysboro 62966 Sp.T.

OAK LAWN

Stickney Public Health District 5636 State Rd., Oak Lawn 60459 M.S.S.

OAK PARK

Community Nursing Service of Oak Park & River Forest 124 S. Marion St., Oak Park 60302 P.T.—S.T.—O.T.—H.H.A.

OREGON

Ogle County Board of Health 106 S. 5th St., Oregon 61061 P.T.

OTTAWA

Ottawa Public Health Nursing Assn. 417 W. Madison St., Ottawa 61350 P.T.-S.T.

PARK FOREST

Park Forest Public Health Nursing Service 200 Forest Blvd., Park Forest 60466 H.H.A.

PEKIN

Pekin Memorial Hospital Corner of Court & 14th Sts., Pekin 61554 H.H.A.

PEORIA

Peoria County Health Department 2114 N. Sheridan Rd., Peoria 61604 P.T.—S.T.—O.T.—M.S.S. Visiting Nurse Assn. of Peoria 510 W. High St., Peoria 61606 H.H.A.

PETERSBURG

Menard County Health Department Court House, Petersburg Sp.T.

PITTSFIELD

Pike County Health Department Court House, Pittsfield 62363 P.T.

PONTIAC

Livingston County Public Health Dept. 419 Bank of Pontiac Bldg., Pontiac 61764 P.T.

PRINCETON

Bureau County Health Department Hotel Clark, Princeton 61356 Sp.T.

QUINCY

Adams County Health Department 333 N. Sixth St., Quincy 62301 P.T.—M.S.S.

ROCK FALLS

Whiteside County Board of Health 201 W. First St., Rock Falls 61071 P.T.

ROCK ISLAND

Board of Health of the County of Rock Island Rock Island County Courthouse, Rock Island 61201
P.T.—Sp.T.—O.T.
Visiting Nurse Association

P.1.—Sp.1.—O.1.
Visiting Nurse Association
1019—27th Ave., Rock Island 61201
P.T.—Sp.T.—O.T.

ROCKFORD

Visiting Nurses Association of Rockford 703 Grove St., Rockford 61108 P.T.

SHELBYVILLE

Shelby County Health Department 123 N. Broadway, Shelbyville 62565 Sp.T.—P.T.

SILVIS

Silvis-Carbon Cliff Visiting Nurse Assn. 1040 First Ave., Silvis 61282 P.T.—Sp.T.—O.T.

SKOKIE

Visiting Nurse Assn' of Skokie Valley 5255 Main St., Skokie 60076 P.T. Skokie Health Department 5127 Oakton St., Skokie 60076 P.T.

SPARTA

Randolph County Health Department 112 W. Jackson St., Sparta 62286 P.T.

SPRINGFIELD

Visiting Nurse Assn' of Sangamon County 730 E. Vine St., Springfield 62703 P.T.

TAYLORVILLE

Christian County Health Department 106 E. Main St., Taylorville P.T.—Sp.T.

TUSCOLA

Douglas County Health Department 705 N. Main St., Tuscola 61953 P.T.

WATSEKA

The Iroquois Hospital
200 Fairman St., Watseka 60970
P.T.—Sp.T.

WAUKEGAN

Community Nursing Service of Lake County, Inc. 2307 Grand Ave., Waukegan 60085 P.T.—Sp.T.—O.T.

WHEATON

DuPage County Health Dept. & Nursing Service 222 E. Willow, Wheaton 60188 P.T.—Sp.T.—O.T.—H.H.A.

WILMETTE

Wilmette Visiting Nurse Assn' and Health Center 905 Ridge Rd., Wilmette 60091 P.T.

YORKVILLE

Kendall County Health Department County Court House, Yorkville 60560 P.T.

WINNETKA

North Shore Visiting Nurse Assn' 614 Lincoln Ave., Winnetka 60093

MEDICAL SCHOOLS IN THE STATE OF ILLINOIS

Chicago Medical School 710 S. Wolcott Ave. Chicago, Ill. 60612 Leroy Levitt, M.D., Dean CA 6-4100

Northwestern University Medical School 303 E. Chicago Ave. Chicago, Ill. 60611

Richard H. Young, M.D., Dean 649-8649

University of Chicago School of Medicine 950 E. 59th St. Chicago, Ill. 60637 Leon Jacobson, M.D., Dean MU 4-6100

University of Illinois College of Medicine 1853 W. Polk St. Chicago, Ill. 60612 Granville A. Bennett, M.D., Dean 663-7000

Stritch School of Medicine-Loyola University Hines, Ill. MU 1-5330 921-2610 John F. Sheehan, M.D., Dean 706 S. Wolcott Ave. Chicago, Ill. 60612 SE 3-8040

APPROVED SCHOOLS OF X-RAY TECHNOLOGY

ARLINGTON HTS.—Northwest Community Hospital

AURORA—Copley Memorial Hospital St. Joseph Mercy Hospital

BLOOMINGTON—Bloomington-Normal Hospital

BLUE ISLAND—St. Francis Hospital CHAMPAIGN—Burnham City Hospital

Medicine

CHICAGO—Chicago Wesley Memorial Hospital Cook County Graduate School of

> Edgewater Hospital Englewood Hospital Evangelical Hospital

Franklin Boulevard Community

Hospital Grant Hospital

Illinois Masonic Hospital

Louis A. Weiss Memorial Hospital Lutheran Deaconess Hospital

Mary Thompson Hospital Michael Reese Hospital

Mt. Sinai Hospital

Norwegian-American Hospital Presbyterian-St. Luke's Hospital

Provident Hospital Ravenswood Hospital

Roseland Community Hospital

St. Anne's Hospital

St. Bernard's Hospital St. Elizabeth's Hospital

St. Joseph Hospital

St. Mary of Nazareth Hospital South Chicago Community Hospital

Woodlawn Hospital

DANVILLE-Lake View Memorial Hospital DECATUR—Decatur and Macon County Hospital

DIXON-Dixon Public Hospital

EAST ST. LOUIS—Centreville Township Hospital

ELMHURST—Memorial Hospital of DuPage County

EVANSTON—St. Francis Hospital

EVERGREEN PARK-Little Company of Mary Hospital

HARVEY-Ingalls Memorial Hospital

HINSDALE—Hinsdale Sanitarium and Hospital

JOLIET—Silver Cross Hospital

KANKAKEE-St. Mary's Hospital

KEWANEE—Kewanee Public Hospital

MOLINE-Moline Public Hospital

OAK PARK-West Suburban Hospital

PARK RIDGE—Lutheran General Hospital

PEORIA—Methodist Hospital of Central Illinois St. Francis Hospital

QUINCY—Blessing Hospital St. Mary Hospital

ROCKFORD-Rockford Memorial Hospital St. Anthony Hospital Swedish-American Hospital

ROCK ISLAND—St. Anthony's Hospital

SKOKIE—Skokie Valley Community Hospital

SPRINGFIELD-Memorial Hospital St. John's Hospital

URBANA—Carle Memorial Hospital Mercy Hospital

APPROVED SCHOOLS OF NURSING

Associate Degree **Nursing Program**

A coeducational nursing program under the auspices of a junior college, two years in length, and leading to an Associate Degree in Nursing. The curriculum consists of arts and sciences at the junior college level and nursing theory closely coordinated with nursing practice, under direction and supervision of the college faculty, in community hospitals and health facilities.

Graduates, both men and women, are prepared to give patient-centered care in staff nurse positions in hospitals, nursing homes and similar situations. They are prepared to cooperate and to share responsibility for the patient's welfare with other members of the nursing and health staff, and to develop their own skills through experience as practicing nurses.

BELLEVILLE

Belleville Junior College Department of Nursing 2250 West Blvd. 62221 **CHICAGO**

Amundsen-Mayfair Junior College Department of Nursing 4626 N. Knox Ave.

60630

CHICAGO HEIGHTS Bloom Community College Department of Nursing

10th & Dixie Highway 60411

CICERO

J. Sterling Morton Junior College Department of Nursing 2423 S. Austin Blvd.

60650

ELGIN

Elgin Community College Department of Nursing

373 E. Chicago St. 60120

ROCKFORD

Rock Valley College

Associate Degree Nursing Program 3301 N. Mulford Rd. 61111

Baccalaureate Degree

Nursing Program

A coeducational nursing program under the auspices of a college or university, which is usually four academic or calendar years in length. The curriculum combines general education with nursing education, leading to the Bachelor of Science Degree in Nursing. Its general and professional education are coordinated; literature, fine arts and other liberal education courses are shared with all college students; courses in communication skills and the biological, physical and behavorial sciences serve as the base upon which nursing courses are built.

General Entrance Requirements:

Age 17 to 50 years.

Good health.

High school graduation: with courses in bioological and physical sciences (1-2 units, one of which should be chemistry) and mathematics (1-2 units).

Satisfactory results on entrance examinations and qualification for admission to the college and the nursing curriculum.

Cost: tuition in public supported junior colleges is low, in private colleges considerably higher. Add to this: fees, books, uniforms and maintenance.

Living Arrangements: students live at home, in a college dormitory or other approved residence.

Graduate is eligible to take the state examination for licensure as a registered nurse ("R.N.").

HARVEY

Thornton Junior College Department of Nursing 151st St. & Broadway

60164

LaSALLE

Illinois Valley Community College Associate Degree Nursing Program Fifth and Chartres 61301

MOLINE

Black Hawk College Department of Nursing

1001 Sixteenth St. 61265

NORTHLAKE

Triton College

Department of Nursing

1000 Wolf Rd. 60164

PALATINE

Harper College Associate Degree **Nursing Program**

34 W. Palatine Rd. 60067

Graduates, both men and women, are prepared for beginning nursing positions in hospitals, nursing homes and community health services, and for advancement without further formal education to positions such as "nursing team" leader or head nurse. They also have the foundations for continuing personal and professional development and for graduate study and specialization in nurs-

General Entrance Requirements:

Age: 17 years minimum.

Good health.

High school graduation: college preparatory program including biology and physical sciences (1-2 units, one of which should be chemistry) and mathematics (1-2 units). Two years of a foreign language may be required. Satisfactory results on entrance examinations and qualification for admission to the college or university.

Cost: college or university tuition fees for nursing programs are comparable to those for other

BLOOMINGTON

Illinois Wesleyan University	
Brokaw Collegiate School of	
Nursing	61701
CHICAGO	
DePaul University	
Department of Nursing	
25 E. Jackson Blvd.	60604
Loyola University	
School of Nursing	
6526 N. Sheridan Rd.	60625
North Park College	
Department of Nursing	
5125 N. Spaulding Ave.	60625

majors. Range in Illinois is from approximately \$1,000 to \$7,000 for tuition and fees for total program. Other expenses: books, uniforms, maintenance.

Living Arrangements: students live at home, in a college dormitory or other approved residence.

Graduate is eligible to take state examination for licensure as a registered nurse ("R.N.").

St. Xavier College	
School of Nursing	
103rd & Central Park	60655
University of Illinois	
College of Nursing	
808 S. Wood St.	60612
DEKALB	
Northern Illinois University	
School of Nursing	60115
EDWARDSVILLE	
Southern Illinois University	
Department of Nursing	62025
KANKAKEE	
Olivet Nazarene College	
Department of Nursing	60901

Diploma (Hospital) Nursing Program

A nursing program under the auspices of a hospital or independent school of nursing, two to three years in length, and leading to a Diploma in Nursing. A college or university may provide some of the courses. The curriculum consists of theory and practice focused primarily on insruction and related clinical experience in the nursing care of patients in hospitals. Some liberal arts courses may be included.

Graduates, both men and women, have the understanding and skills necessary to organize and implement a plan of nursing that will meet the immediate needs of one or more patients and that will promote the restoration of health. They are also able to plan with associated health personnel for the care of patients, and may be responsible for the direction of other members of the nursing team.

General Entrance Requirements:

Age: 17 to 35 years.

Good health.

High school graduation: Usually upper half of class, with courses in biological and physical sciences (1-2 units, one of which should be chemistry) and mathematics (1-2 units).

Satisfactory results on entrance tests and qualification for admission to the school.

Cost: \$800 to \$3,000; some include full maintenance.

Living Arrangements: All schools have residence facilities; many permit students to live at home if preferred.

Graduate is eligible to take the state examination for licensure as a registered nurse ("R.N.").

ALTON

Alton Memorial Hospital	
Memorial Drive	62004
St. Joseph's Hospital	
915 E. Fifth St.	62004
AURORA	
Copley Memorial Hospital	
Lincoln & Weston	60507
BLOOMINGTON	
Mennonite Hospital	
804 N. East St.	61701
CANTON	
Graham Hospital	
210 W. Walnut St.	61520
CHAMPAIGN	
Julia F. Burnham—	
Burnham City Hospital	
404 S. Third St.	61822

CHICAGO

Augustana Hospital	
411 Dickens Ave.	60614
Chicago Wesley Memorial Hospital	
250 E. Superior St.	60611
Columbus Hospital	
2520 Lakeview Ave.	60614
Cook County	
1900 W. Polk St.	60612
Hospital of St. Anthony dePadua	
2875 W. 19th St.	60623
Illinois Masonic Hospital	
836 Wellington Ave.	60657
James Ward Thorne—	
Passavant Memorial Hospital	
244 East Pearson St.	60611
Michael Reese Hospital and Medical	Center
2816 S. Ellis Ave.	60616

Manut Singi Hamital Madical Cont	. 0	Silver Cross Hasnital	
Mount Sinai Hospital Medical Cent	.er 60608	Silver Cross Hospital 600 Walnut St.	60432
2730 W: 15th Place	00000		00432
Ravenswood Hospital	60640	MOLINE	
1931 W. Wilson Ave.	00040	Lutheran Hospital	(1265
Roseland Community Hospital	(0(20	555 Sixth St.	61265
45 W. 111th Ave.	60628	Moline Public Hospital	(1265
St. Anne's Hospital	60654	622 Fifth Ave.	61265
4980 W. Thomas	60651	OAK LAWN	
St. Bernard's Hospital		Evangelical (Christ Community Hospi	tal)
6344 S. Harvard Ave.	60621	4540 S. Morgan	
St. Elizabeth's Hospital		OAK PARK	
1431 N. Claremont Ave.	60622	Oak Park Hospital	
St. Mary of Nazareth Hospital		500 S. Maple Ave.	60304
1127 N. Oakley Blvd.	60622	West Suburban Hospital	
South Chicago Community Hospital		518 N. Austin Blvd.	60302
2320 E. 93rd St.	60617	PARK RIDGE	
Swedish Covenant Hospital		Lutheran General and Deaconness H	Iospitals
5145 N. California	60625	1700 Western Ave.	60068
Walther Memorial Hospital		PEORIA	00000
1116 N. Kedzie	60651		
DANVILLE		Methodist Hospital of Central Illinois 221 N.E. Glen Oak	61602
Lake View Memorial Hospital			61603
812 N. Logan Ave.	61833	St. Francis Hospital	(1(0)
St. Elizabeth's Hospital		211 Greenleaf St.	61603
600 Sager Ave.	61832	QUINCY	
DECATUR	01052	Blessing Hospital	
Decatur and Macon County Hospital		1005 Broadway	62301
2300 N. Edward St.	62526	ROCKFORD	
EVANSTON	02320	Rockford Memorial Hospital	
Evanston Hospital		2400 N. Rockton Ave.	61101
2645 Girard Ave.	60201	St. Anthony's Hospital	
	00201	1411 E. State St.	61108
St. Francis Hospital	60202	Swedish-American Hospital	
319 Ridge Ave.	60202	1316 Charles St.	61101
EVERGREEN PARK		ROCK ISLAND	
Little Company of Mary Hospital	60612	St. Anthony's Hospital	
2800 W. 95th St.	60642	767 Thirtieth St.	61201
FREEPORT		SPRINGFIELD	01201
Freeport Memorial Hospital			
1335 W. Stephenson	61032	Memorial Hospital	62701
GALESBURG		200 W. Dodge St.	02/01
Galesburg Cottage Hospital		St. John's Hospital	60501
674 N. Seminary Ave.	61401	821 E. Mason St.	62701
JACKSONVILLE		URBANA	
Passavant Memorial Area Hospital		Mercy Hospital	
1600 W. Walnut St.	62650	1405 W. Park St.	61801
JOLIET		WAUKEGAN	
St. Joseph's Hospital		St. Therese Hospital	
333 N. Madison St.	60435	W. Washington St.	60085

Practical Nursing Program

A coeducational nursing program under the auspices of public vocational education systems, hospitals or community agencies, usually one year in length. The curriculum includes nursing theory and practice consistent with a short-term program—body structure and functioning, nutrition, vocational relationships, personal hygiene and community health.

Graduates, both men and women, of programs in practical nursing are prepared for two roles: (1) under the supervision of a professional nurse or physician, they give nursing care to patients in situations relatively free of scientific complexity; (2) in a close working relationship, they assist the professional nurse in giving care to patients requiring a high degree of nursing skill and judgment.

Entrance Requirements:	Cost: None under MDTA programs, to approxi-
Age: generally 17 to 55 years.	mately \$400 plus maintenance.
Good health. High school: Two years minimum, graduation	Living Arrangements: Students usually live at home or in housing approved by school.
desirable.	Graduate is eligible to take the state examina-
Satisfactory results on entrance tests. References and personal interview	tion for licensure as a practical nurse ("L.P.N.").
References and personal interview	
ALTON	HINSDALE
F. W. Olin School of Practical Nursing	Hinsdale Sanitarium and Hospital School of
2200 College Ave. 62002	Practical Nursing
AURORA	120 N. Oak St. 60521 JACKSONVILLE
McAuley Mercy School of Practical Nursing 421 N. Lake St. 60506	Jacksonville Board of Education School of
BLOOMINGTON	Practical Nursing 504 E. Court St. 62650
Bloomington School of Practical Nursing	JOLIET 02050
709 S. Clinton St. 61701	Joliet Township H.S. School of Practical
CARBONDALE Southern Illinois University Vocational Public	Nursing
Technical Institute of Practical Nursing,	201 E. Jefferson St. 60432
Manpower Division (MDTA) 62901	KANKAKEE Vonkakaa Sahaal of Practical Nursing
CHAMPAIGN	Kankakee School of Practical Nursing 293 E. Court St. 60901
Champaign School of Practical Nursing	LASALLE 00001
103 N. Prospect Ave. 61820	St. Mary's Hospital School of Practical
Chicago Public Schools Pro di al Numira	Nursing
Chicago Public Schools Practical Nursing Program, Chicago Board of Education	1015 O'Connor St. 61301
1820 W. Grenshaw 60612	MATTOON Mattoon School of Practical Nursing
Practical Nurses Training Program, Chicago	South Route 45 61938
Board of Education, Manpower Division	MAYWOOD
(MDTA) 535 E. 35th St. 60616	Proviso Township School of Practical Nursing
St. Frances X. Cabrini School of Practical	807 S. First Ave. 60154
Nursing	MT. CARMEL
811 S. Lytle St. 60607	Wabash Valley College Practical Nursing Program
DANVILLE	2222 College Dr. 62863
Danville Junior College School of Practical	MT. VERNON
Nursing 305 W. Madison St. 61833	Mt. Vernon School of Practical Nursing
DECATUR 01633	Seventh & Casey Sts. 62864
Decatur School of Practical Nursing	OAK FOREST Oak Forest Hospital School of Practical
210 W. North St. 62523	Nursing
DIXON	15900 S. Cicero 60452
Dixon State School of Practical Nursing	PEORIA
2600 N. Brinton Ave. 61021	Peoria School of Practical Nursing
EAST END PEKIN	609 W. High St. 61606 QUINCY
Pekin Practical Nurse Program	Quincy School of Practical Nursing
Pekin Community High School 61554	1200 Main St. 62301
EAST ST. LOUIS Board of Education District 189 School of	ROCK ISLAND
Practical Nursing	Rock Island County School of Practical
3105 Missouri Ave. 62205	Nursing
GALESBURG	2122 Twenty-Fifth Ave. 61201 ROCKFORD
Galesburg Practical Nurse Program	Rockford School of Practical Nursing
650 Locust St. 61401	201 S. Madison 61101
HARRISBURG	SKOKIE
Southeastern Illinois College School of Prac-	Niles Township H.S. School of Practical
tical Nursing 333 W. College St. 62946	Nursing Niles Ave. at Lincoln 60076
02)40	Titles 21 to. at Ellicom 000/0

SPRINGFIELD

Springfield School of Practical Nursing Second & Laurel Sts. 62704

STERLING

Sterling Township High School Practical Nursing Program 61081

1608 Fourth Ave.

STREATOR

Streator Township High School Practical Nursing Program

61364

WAUKEGAN

Waukegan Township High School Practical Nurse Program

1011 Washington St.

60085

APPROVED SCHOOLS OF MEDICAL TECHNOLOGY

AURORA—Copley Memorial Hospital BLUE ISLAND-St. Francis Hospital CHAMPAIGN—Burnham City Hospital

CHICAGO- Alexian Brothers Hospital, Augustana Hospital, Chicago Wesley Memorial Hospital, Edgewater Hospital, Grant Hospital of Chicago, Holy Cross Hospital, Hospital of St. Anthony de Padua, Illinois Masonic Hospital, Louis A. Weiss Memorial Hospital, Michael Reese Hospital, Mount Sinai Hospital, Northwestern University Medical School, (Passavant Memorial Hospital), Presbyterian-St. Luke's Hospital, St. Anne's Hospital, St. Bernard's Hospital, St. Joseph Hospital, St. Mary of Nazareth Hospital, University of Illinois at the Medical Center and Veterans Administration Research Hospital.

CHICAGO HEIGHTS-St. James Hospital DANVILLE-Lake View Memorial Hospital DECATUR—Decatur and Macon County Hospital and St. Mary's Hospital EVANSTON—Evanston Hospital and St. Francis Hospital

EVERGREEN PARK—Little Company of Mary Hospital

FREEPORT-Freeport Memorial Hospital GENEVA—Community Hospital

HARVEY-Ingalls Memorial Hospital

HINSDALE—Hinsdale Sanitarium and Hospital

and St. Joseph Hospital

JOLIET-Silver Cross Hospital

MOLINE-Moline Public Hospital

OAK LAWN—Christ Community Hospital

OAK PARK-West Suburban Hospital

PEORIA-Methodist Hospital, Proctor Community Hospital and St. Francis

Hospital

QUINCY-St. Mary's Hospital

ROCKFORD—Rockford Memorial Hospital, St.
Anthony Hospital and SwedishAmerican Hospital

ROCK ISLAND-St. Anthony's Hospital

SPRINGFIELD-Memorial Hospital and

St. John's Hospital

URBANA—Carle Foundation

WAUKEGAN-St. Therese's Hospital

APPROVED SCHOOLS FOR MEDICAL RECORD LIBRARIANS

CHICAGO—Grant Hospital University of Illinois at the Medical Center

DANVILLE-St. Elizabeth Hospital

APPROVED SCHOOLS OF INHALATION THERAPY

CHICAGO—Cook County Hospital, Edgewater Hospital, University of Chicago Hospitals

SPRINGFIELD-Memorial Hospital, St. John's Hospital

APPROVED SCHOOLS OF CYTOTECHNOLOGY

CHICAGO-Michael Reese Hospital and Medical Center Mount Sinai Hospital University of Chicago Hospitals and Clinics

APPROVED COURSE IN OCCUPATIONAL THERAPY

CHICAGO—University of Illinois College Medicine

APPROVED SCHOOL OF PHYSICAL THERAPY

CHICAGO—Northwestern University Medical School

for October, 1967 547

DEPARTMENT OF CHILDREN AND FAMILY SERVICES

Director's Office:

Room 404, New State Office Bldg., Springfield

Room 1713, 160 N. LaSalle St., Chicago

Cyril H. Winking, Director

Roman L. Haremski, Deputy Director

Richard S. Laymon, Administrative Asst. to

J. Keller Mack, M.D., Medical and Public Health Officer

Thomas Londrigan, Special Counsel Don H. Schlosser, Administrator of Community Relations

Division of Administrative Services:

Matthew J. Finnell, Division Chief Room 404, New State Office Bldg., Springfield

Division of Child Welfare:

Herschel L. Allen, Division Chief 528 S. Fifth St., Springfield

Regional and District Offices-

ROCKFORD REGION (Margaret Kennedy, Reg. Dir.), 428 Seventh St., Rockford Ottawa District, 628 Columbus St., Ottawa

Rock Falls District, 2031/2 First Ave., Rock Falls

CHICAGO REGION (Edward Weaver, Reg. Dir.), 1026 S. Damen, Chicago

AURORA REGION (Leland Wright, Reg. Dir.), 411 W. Galena Blvd., Aurora Joliet District, Rm. 309, 57 W. Jefferson, Joliet

Waukegan District, 4 S. Genessee, Waukegan

PEORIA REGION (Francis Paule, Reg. Dir.), 608 N. E. Jefferson, Peoria

Peoria District, 414 Hamilton Blvd., Peoria

Galesburg District, 121 S. Prairie, Gales-

Rock Island District, 211-18th St., Rock Island

Princeton District, 22 E. Marion, Prince-

SPRINGFIELD REGION (Wm. Sanders, Reg. Dir.), 1035 Outer Park Dr., Springfield Quincy District, 410 N. Ninth, Quincy Carlinville District, 4941/2 West Side Square, Carlinville

Jacksonville District, 602 Westgate, Jacksonville

CHAMPAIGN REGION (Merle Springer, Reg. Dir.), 44 Main St., Champaign

Bloomington District, 309 W. Market, Bloomington

Decatur District, 125 N. Franklin, Decatur

Kankakee District, 70 Meadowview Center

Mattoon District, 1000 Broadway, Mattoon

CARBONDALE REGION (Paul Nelson, Reg. Dir.), 1202 W. Main, Carbondale

Harrisburg District, 10 S. Vine St., Harrisburg

EAST ST. LOUIS REGION (Jack Donahue, Reg. Dir.), 435 Missouri Ave., E. St. Louis

Olney District, 115 S. Fair, Olney Salem District, 205 E. Locust, Salem

Division of Children's Schools:

Lee A. Iverson, Division Chief

Room 404, New State Office Bldg., Spring-

Institutions-

Illinois Braille and Sight Saving School (Jack Hartong, Supt.), Jacksonville Illinois School for the Deaf (Kenneth

Mangan, Supt.), Jacksonville Illinois Children's Hospital-School (Richard Eddy, Supt.), 1950 W. Roosevelt Rd., Chicago

Illinois Soldiers' and Sailors' Children's School, Andrew Spelios, Supt.), Normal Southern Illinois Children's Service Center (Paul Nelson, Supt.), Hurst

Division of Personnel Administration:

Thomas A. Nickell, Division Chief Room 404, New State Office Bldg., Springfield

Division of Planning, Research and Statistics:

William H. Ireland, Division Chief 630 E. Adams St., Springfield

Division of Rehabilitation Services:

Charles Adams, Division Chief

Room 404, New State Office Bldg., Springfield Institutions-

Illinois Eye and Ear Infirmary (George Geocaris, Supt.), 1855 Taylor, Chicago

Illinois Soldiers' and Sailors' Home (James A. Schapers, Supt.), Quincy.

Illinois Visually Handicapped Institute (Thomas Murphy, Supt.) 1151 S. Wood St., Chicago

Visually Handicapped Services—

Community Services for the Visually Handicapped (I. N. Miller, Supt.), Room 1700, 160 N. LaSalle St., Chicago

(field offices located in each regional office -see listings under Division of Child Welfare)

Coordinator of Visually Handicapped Services (Raymond M. Dickinson), 404 New State Office Bldg., Springfield.

DEPARTMENT OF PUBLIC AID

The Illinois Department of Public Aid administers the federally aided public assistance programs: Assistance to the Aged, Blind or Disabled; Aid to Dependent Children; and Medical Assistance. In addition, the department allocates state funds to qualified governmental units for the administration of General Assistance; and in cooperation with the United States Department of Agriculture, administers the Food Stamp program and distributes federally donated foods.

Overall responsibility for the department's administrative responsibilities are delegated by the Governor to the Director of the Illinois Department of Public Aid, Springfield. The director administers the programs through the staffs of eight major divisions located in the state offices, six regional offices, and 102 county departments.

Administrative Staff

Harold O. Swank, Director Gershom Hurwitz, Assistant to the Director Robert L. Hyde, Chief, Division of Accounting and Data Processing

Garrett W. Keaster, Chief, Division of Administrative Services

Henry L. McCarthy, Chief, Division of Community Services

James M. Brown, Chief, Division of Downstate Operations

Henry A. Holle, M.D., Medical Director, Division of Medical Services

Robert G. Wessel, Chief, Medical Administration

Mrs. Janet P. Kahlert, Chief, Division of Program Development

Richard N. Hosteny, Chief, Division of Special Investigations

Kenneth E. Doeblin, Chief, Division of Special Services

Wayne D. Epperson, Chief, Division of Research and Statistics

Regional Offices

Region I —Peoria Frank G. Blumb, Regional Director

Region II —Champaign C. H. Colwell, Regional Director

Region III—Springfield Robert A. Hamrick, Regional Director

Region IV—Belleville Armin A. Rippelmeyer, Regional Director

Region V —Carbondale William M. Fishback,

(Acting) Regional Director

Region VI—Rockford Reno L. Lenz, Regional Director

Legislative Advisory Committee on Public Assistance

The Honorable John W. Carroll, Park Ridge

The Honorable Daniel Dougherty, Chicago

The Honorable William C. Harris, Pontiac

The Honorable Walter P. Hoffelder, Chicago

The Honorable Joseph R. Peterson, Princeton

The Honorable Fred J. Smith, Chicago

The Honorable Esther Saperstein, Chicago The Honorable Merle K. Anderson, Durand

The Honorable Corneal A. Davis, Chicago

The Honorable John Hill, Aurora

The Honorable Robert E. Mann, Chicago

The Honorable Don A. Moore, Midlothian

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Robert H. MacRae, Chicago

Charles A. Davis, Chicago

Robert G. Gibson, Chicago

Chauncey C. Maher, Jr., M.D., Springfield

Mrs. Woods McCausland, Winnetka

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Mrs. Mary L. Ford, Chicago

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George K. Hendrix, Springfield

Mrs. Jeannette Kramer, Palatine

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B. E. Montgomery, M.D., Harrisburg

Robert C. Muehrcke, M.D., Oak Park

Harold W. Pratt, R.Ph., Chicago

Ex Officio members

Edward F. Lis, M.D. Director

Division of Services for Crippled Children

University of Illinois, Chicago

Alfred Slicer, Director

Division of Vocational Rehabilitation, Springfield

Harold M. Visotsky, M.D., Director

Department of Mental Health, Springfield

Cyril H. Winking, Director

Department of Children and Family Services, Springfield

Franklin D. Yoder, M.D., M.P.H., Director Department of Public Health, Springfield

Department of Public Aid Representative

Henry A. Holle, M.D., Medical Director

Division of Medical Services, Department of

Public Aid, Springfield

State Medical Advisory Committee Fred A. Tworoger, M.D., Chicago Rex O. McMorris, M.D., Peoria Charles E. Baldree, M.D., Belleville Robert F. Bettasso, M.D., Ottawa James R. Cooper, M.D., Quincy Heinz Otto E. Hoffmann, M.D. Decatur Chauncey C. Maher, Jr., M.D., Springfield George T. Mitchell, M.D., Marshall L. C. Nesbitt, M.D., Chicago Frank B. Norbury, M.D., Jacksonville Alphonse L. Robinson, M.D., Mounds William Scanlon, M.D., LaSalle Frank P. Skaggs, M.D., Harrisburg John H. Steinkamp, M.D., Belvidere R. Kent Swedlund, M.D., Watseka

Consultants

Edwin S. Hamilton, M.D., Kankakee George F. Lull, M.D., Chicago Burtis E. Montgomery, M.D., Harrisburg Robert C. Muehrcke, M.D., Oak Park

State Drug Advisory Committee Harold W. Pratt, R.Ph., Chicago Miles N. Brown, R.Ph., Mount Vernon W. Edwin Brown, R.Ph., Quincy Carl V. Daschka, R.Ph., Chester H. M. F. Doden, Sr., R.Ph., Rock Island Justin Eisele, R.Ph., East St. Louis Louis Gdalman, R.Ph., Chicago John T. Gulick, R.Ph., Danville John F. Koller, R.Ph., Berwyn Roy B. Maher, R.Ph., Springfield Theodore R. Sherrod, R.Ph., M.D., Chicago Harold J. Shinnick, R.Ph., Chicago Charles P. Skaggs, R.Ph., Harrisburg.

State Deutal Advisory Committee John C. Barrett, D.D.S., Freeport Ross Bradley, D.D.S., Jacksonville John J. Byrne, D.D.S., Chicago John C. Clarno, D.D.S., Peoria Vernon J. Haas, D.D.S., Bloomington Lewis K. Holzman, D.D.S., Chicago Eugene J. Jaffe, D.D.S., Chicago D. J. McCullough, D.D.S., Mt. Vernon H. B. Riley, D.D.S., Newton William J. Rogers, D.D.S., Chicago Carl L. Sebelius, D.D.S., M.P.H., Springfield Harold H. Sitron, D.D.S., Chicago

State Advisory Committee on **Group Care Facilities** Don T. Barry, Raymond Taylor O. Braswell, Belleville Edward Cannady, M.D., East St. Louis Bert Cohn, Okawville Mrs. Rachel Dodson, Herrin Markham D. Hay, Rockford Mrs. Bernice Hover, Chicago Elmer Johnson, Joliet Mrs. Laverta Johnson, Chicago Mrs. Jeannette Kramer, Palatine Robert E. Lanier, Springfield Roger F. Sondag, M.D., M.P.H., Springfield

State Advisory Committee on Standards of Assistance Mrs. Margaret H. Brookes, Ph.D., Chicago Miss Gertrude Kaiser, Urbana Miss Virginia Jauch, Chicago Miss M. Louise Mojonnier, Ph.D., Chicago Mrs. Dorothy G. Van Bortel, Ph.D., Chicago Miss Ritta Whitesel, Champaign

DIVISION OF VOCATIONAL REHABILITATION

The Board of Vocational Education and Rehabilitation is a statutory body, established to administer, through two operating divisions, the state program of vocational and technical education pursuant to the Federal Vocational Education Act as amended, and the state program of vocational rehabilitation pursuant to the Federal Vocational Rehabilitation Act as amended.

Board of Vocational Education and Rehabilitation

Ex Officio:

Director of Agriculture Director of Labor Director of Mental Health Director of Public Health Director of Registration and Education Superintendent of Public Instruction

Appointive Members (appointed by Governor):

Lee Chapman, Springfield William Gellman, Ph. D., Chicago Edward I. Elisberg, M.D., Highland Park George R. Koons, Chicago Guy R. Renzaglia, Ph. D., Carbondale William R. Rutherford, Peoria

Executive Officers:

For vocational education: Ray Page, Superintendent of Public Instruction For vocational rehabilitation: Alfred Slicer Director, Division of Vocational Rehabilita-

Division of Vocational Rehabilitation

Alfred Slicer, Director 623 East Adams, Springfield 62706

Division of Vocational and Technical Education

John A. Beaumont, Director 405 Centennial Building, Springfield 62706

DEPARTMENT OF REGISTRATION AND EDUCATION

John C. Watson, Director

John B. Hayes, Superintendent of Registration

Ira T. Dawson, Assistant Director

Frank R. Petrone, Coordinator, Division of Professional Supervision

The department is primarily concerned with the registration, licensing and enforcement of 31 laws governing the different professions, trades and occupations, including the Medical Practice Act. Enforcement of the Medical Practice Act is in the newly created Division of Professional Supervision headed by a coordinator. Registration and licensing is under the jurisdiction of the Division of Registration headed by the Superintendent of Registration.

The Medical Examining Committee appointed by the director of the department operates within the framework of the act and is charged with the responsibility of giving examinations for licensure, hearing complaints for revocation and suspension of licenses and promulgating rules and regulations for the administration of the act.

Medical Examining Committee

William Johnson, M.D., Galesburg Daley Richerson, D.O., Pontiac Kenneth H. Schnepp, M.D., Springfield Warren D. Tuttle, M.D., Harrisburg Robert R. Walper, D.C., Chicago

Medical Practice Act

LICENSING AND ENFORCEMENT PROCEDURES

Illinois statures provide for licensing of physicians to practice medicine "(1) in all of its branches, and (2) licensing of those persons to treat human ailments without the use of drugs or medicine and without operative surgery."

The Medical Practice Act states, "no persons shall practice medicine or any of its branches or midwifery, or any system or method of treating human ailments without the use of drugs or medicines, or without operative surgery, without a valid existing license to do so." Applicant for license must pass an examination of his qualifications which must be satisfactory to the Department of Registration and Education.

REQUIRED EDUCATION

Minimum standards of professional education: 2 years' course of instruction in a college of liberal arts or its equivalent, or in such medical college in a course of instruction in the treatment of human ailments which course shall have been not less than 132 weeks in duration and shall have been completed within a period of not less than 35 months and in addition, a course of clinical training of not less than 12 months in a hospital. The college of liberal arts, medical school, and hospital must be reputable and in good standing in the judgment of the Department of Registration and Education.

All examinations provided by the Medical Practice Act shall be conducted by the Department of R&E. Examinations of applicants who seek to practice medicine in all of its branches which shall embrace the subjects of which knowledge is generally required of candidates for the degree of Doctor of Medicine by reputable medical colleges in the U.S., and shall be such in the judgment of the Department of R&E that will determine the qualifications of applicants to practice medicine in all of its branches.

Every license issued under the Act expires on July 1 of each even-numbered year. Every licensee under the Act may, biennially during the month of June of each even-numbered year, renew his license upon paying to the Department a renewal fee of \$10.

REVOCATION AND SUSPENSION OF LICENSE OR CERTIFICATE

The department may revoke or suspend the license, certificate, or state hospital permit of any person licensed under the act upon any of the following grounds:

- "1. Conviction of procuring or attempting or aiding to procure such an abortion as was made unlawful at the time under the Criminal Code of this State;
- Conviction in this or another state of any crime which is a felony under the laws of this state or conviction of a felony in a federal court.
- Gross malpractice resulting in permanent injury or death of a patient;
- Engaging in dishonorable, unethical or unprofessional conduct of a character likely to deceive, defraud, or harm the public;
- 5. Obtaining a fee, either directly or indirectly, either in money or in the form of anything else of value or in the form of financial profit as personal compensation, or as compensation, charge, profit or gain for an employer or for any other person or persons, on the fraudulent representation that a manifestly incurable condition of sickness, disease or injury of any person can be permanently cured;
- Habitual intemperance in the use of ardent spirits, narcotics, or stimulants to such an extent as to incapacitate for performance of professional duties;
- Holding one's self out to treat human ailments under any name other than his own, or the personation of any other physician;
- 8. Employment of fraud, deception or any unlawful means in applying for or securing a license, certificate, or state hospital permit to practice the treatment of human ailments in any manner, or to practice midwifery, or in passing an examination therefor, or willful and fraudulent violation of the rules

- and regulations of the department governing examinations;
- Holding one's self out to treat human ailments by making false statements, or by specifically designating any disease, or group of diseases and making false claims of one's skill or the efficacy or value of one's medicine, treatment or remedy therefor;
- 10. Professional connection or association with, or lending one's name to, another for the illegal practice by another of the treatment of human ailments as a business, or professional connection or association with any person, firm, or corporation holding himself, themselves, or itself out in any manner contrary to this Act;
- Revocation or suspension of a medical license in a sister state.
- A violation of any provision of this Act or of the rules and regulations formulated for the administration of this Act;
- 13. Except as otherwise provided in Section 16.01, advertising or soliciting by himself or through another, by means of hand bills, posters, circulars, stereopticon slides, motion pictures, radio, newspapers or in any other manner for professional business."

Section 16.01. Any person licensed under this Act may list his name, title, office hours, address, telephone number and any specialty in professional and telephone directories; may announce by way of a professional card not larger than 31/2 inches by 2 inches, only his name, title, degree, office location, office hours, phone number, residence address and phone number and any specialty; may list his name, title, address and telephone number and any specialty in public print limited to the number of lines necessary to state that information; may announce his change of place of business; absence from, or return to business in the same manner; or may issue appointment cards to his patients, when information thereon is limited to the time and place of appointment and that information permitted on the professional card. Listings in public print, in professional and telephone directories, or announcements of change of place of business, absence from, or return to business, may not be made in bold faced type.

Rules and Regulations Adopted for the Administration of the Illinois Medical Practice Act, Effective March 18, 1955

RULE 1—ACCREDITED COLLEGES OF MEDICINE AND SURGERY

Medical colleges having rules and curricula commensurate with and equivalent to the rules and curricula of the Colleges of Medicine of the University of Illinois, will be considered for accreditation by the Department of Registration and Education.

RULE II—ACCREDITED COLLEGES TEACHING SYSTEMS OF TREATING HUMAN AILMENTS WITHOUT THE USE OF DRUGS OR MEDICINE AND WITHOUT OPERATIVE SURGERY.

A professional college or institution teaching a system of treating human ailments without the use of drugs or medicine and without operative surgery shall be deemed reputable and in good standing in the judgment of the Department upon submission of proof of the following requirements:

- (a) That a Dean or other Executive Officer, employed on a full-time basis supervises the students and curriculum.
- (b) That the faculty is comprised of graduates in their specialty from recognized professional colleges or institutions.
- (c) That the faculty is organized and each department has a director, professors, associate professors and assistant professors, each responsible to his superior for his instruction in the particular subject he teaches.
- (d) That, annually, a catalogue or brochure is published setting forth the requisites for admission to the college, tuition rates, courses offered, dates of sessions, schedule of classes, requirements for graduation, a roster of the undergraduate students and a roster of the last graduating class. The catalogue or brochure shall contain a list of the departments of the school, the titles of the personnel and a brief summary of each person's qualifications. The curriculum shall include, but not be limited to, four academic years' instruction in the following subjects:
 - (1) Anatomy
 - (a) Embryology
 - (b) Histology
 - (c) Neuro-anatomy
 - (2) Physiology and Chemistry
 - (3) Pathology and Bacteriology
 - (4) Diagnosis
 - (a) Physical
 - (b) Differential
 - (c) Laboratory
- (e) That suitable buildings provided with laboratories equipped for instruction in antomy, chemistry, physiology, pathology, bacteriology and other areas of learning necessary to the due course of study prescribed by these rules; and that a laboratory equipped with supplies, models, manikins, charts, stereopticon, roentgen-ray and other special apparatus used in teaching the system to treat human ailments without the use of medicine and operative surgery, be provided.
- (f) That a working library, easily accessible to students, is maintained from at least 9 a.m. to 5 p.m., with a librarian in constant attendance. The library shall contain a standard medical dictionary, the modern text and reference books, and the files of leading periodicals dealing with the particular system of treating human ailments without the use of medicine and operative surgery.
 - (g) That the college or institution requires all

students to furnish, before matriculation, satisfactory proof of the preliminary education required by the Medical Practice Act.

- (h) That full and complete records are kept showing the credentials for admission, attendance, grades and financial accounts of each student.
- (i) That admission of transfer students will be limited to honorably dismissed students from another approved college or institution teaching the same system. The transcript of record obtained directly from the transferring school shall be kept on file. It shall be the duty of a college or institution to furnish such a transcript for the benefit of each student subject to honorable dismissal. No credit shall be given a transferred student for final or "senior year" work or for any courses taken by correspondence.
- (j) That students shall start class attendance within one week of the start of each session. That credit for completion of a course will not be granted a student who failed to attend 80 per cent of the complete session of the course.

RULE III—HOSPITALS APPROVED FOR INTERNSHIP.

- 1. A hospital shall, in the judgment of the Department be deemed reputable and in good standing for training interns and intern services when it meets the following standards:
 - (a) General hospital of 150 beds' capacity, with an average of at least 60 patients daily, with rotating service.
 - (b) Shall contain at least the departments of internal medicine, surgery, obstetrics and pediatrics; and an organized departmentalized staff, holding meetings monthly for case reviews and study.
 - (c) Laboratory employing a full-time qualified technician and at least a part-time qualified pathologist, visiting the laboratory at least two days per week.
 - (d) Radiological department employing a qualified X-ray technician and at least a part-time qualified roentgenologist, visiting the department at least two days per week.
 - (e) Maintenance of an up-to-date medical library located in a suitable study room available to interns.
 - (f) Such hospital shall provide and furnish the Department with the names of staff members of the various departments of the hospital.
 - (g) The hospital, upon the completion of a course of training therein of not less than twelve months, shall issue its certificate therefor to any such intern or at the request of the Department, such certificate shall include therein, by date, the commencement and the conclusion thereof.
- 2. An approved internship shall consist of a twelve months' rotating service in medicine, surgery, obstetrics and pediatrics, with an election in medical specialties.

In the event an applicant has received training in excess of the twelve months' period specified by the Medical Practice Act, and if this be in an institution approved by the Department as adequate for specialty training; and if the applicant has received certification by a recognized Medical Specialty Board, and has had two or more years' specialty practice or Military Service; such training and practice may be accepted as the equivalent of a rotating internship.

Any applicant who shall have completed twelve months of clinical training in a hospital, as required by Section 5-1(b) of the Medical Practice Act, and who has been accepted for further training in a specialty or general practice residency program by a hospital or institution approved by the Department for that purpose, shall be deemed to have complied with the requirements of this rule and of the Medical Practice Act in this regard.

RULE IV-APPLICATION FOR EXAMINATION

An applicant for examination for licensure to practice medicine in all of its branches, or any system of treating human ailments without the use of drugs or medicine and without operative surgery, must make application on forms furnished by the Department at least fifteen days prior to the examination and present, in addition:

- (a) Recommendations from two (2) physicians duly licensed to practice in some state in the United States.
- (b) A recent photograph, passport size, signed by applicant and the two persons licensed to practice the system of treatment of human ailments for which the applicant is seeking a license. A duplicate photograph must be presented with the card of admission at the examination.
- (c) The original diploma of graduation from the professional college in which the applicant completed his course of training, or, in lieu of presenting the diploma with the application, the applicant may present it at the examination.
- (d) A certified copy of secondary school and professional school studies to be mailed direct to the Department by the schools attended or by the professional schools where the applicant completed the required course of study.
- (e) Proof of completion of a rotating internship of twelve months in an approved hospital for applicants seeking admission to examination for license to practice medicine in all of its branches; and, in the case of graduates of medical colleges in countries other than the United States and Canada, who apply for examination after January 1, 1953, proof of rotating internships of one year in approved hospitals in the United States.

A candidate under Section 5, paragraph Ib or Section 13, may apply for the examination or clinical test and take the examination given immediately prior to completion of his internship provided he furnishes a statement from the hospital authorities stating his internship has been satisfactory to date. The results of the examination will be withheld and no license will be issued until the Department receives proof of satisfactory completion of the required internship in an approved hospital training program.

(f) Applicants who completed their medical courses in the extramural colleges of Ireland and Scotland shall not be eligible for admission to examinations for licensure under the Illinois Medical Practice Act.

(g) Graduates of European colleges or universities after January 1, 1943, with the exception of certain approved colleges in the British Isles, Denmark, Holland, Norway, Sweden and Switzerland, be not accepted for admission to examinations for licensure under the Illinois Medical Practice Act.

Graduates of such European medical colleges after January 1, 1943 may be considered for admission to Illinois examinations provided they present diplomas of graduation from approved medical colleges in the United States after attendance in such colleges for at least one year; and in addition, have served rotating interships of one year in approved hospitals in the United States.

(h) An applicant who presented a diploma of graduation from an approved school will not be accepted, if he was accorded advanced standing in such school based upon his prior education in an unapproved school.

RULE V-EXAMINATIONS

1. Examinations for licensure to practice medicine in all of its branches shall be conducted in the English language and shall be in the following theoretical and practical areas of medicine:

THEORETICAL

Chemistry
Physiology
Anatomy
Pharmacology
Pathology
Bacteriology
Medicine
Public Health & Preventive Medicine
Obstetrics & Gynecology
Surgery
Pediatrics
Psychiatry

CLINICAL

General Practice of Medicine

2. Examinations for licensure to practice the treatment of human ailments without the use of drugs or medicine and without operative surgery shall be conducted in the English language and shall be in the following theoretical and practical subjects:

THEORETICAL

Chemistry & Physiology
Anatomy & Histology
Pathology & Bacteriology
Diagnosis
Hygiene & Medical Jurisprudence
Eye, Ear, Nose, & Throat
Dermatology, Pediatrics & Neurology
System of Practice
Obstetrics (of graduates of approved osteopathic colleges)

PRACTICAL

System of Practice

3. To be successful, applicants must receive general averages of 75% with no grade below 60 in the written examination, and a general average of 75% in the clinical or practical test.

Applicants applying for registration under Sections 12 and 12a of the Medical Practice Act shall be required to make general averages of 75% in the three subjects required for license to practice medicine and surgery in Illinois.

- 4. In case of failure in the first and second examinations applicants will be allowed credit on the following examination for all grades of 75 or more; but in case of failure in the third examination they must retake all written subjects at each subsequent examination. It is not required that the clinical or practical part of the examination be repeated after a passing grade of 75 has been received in that part of the examination.
- 5. Applicants who take the regular examination conducted by the Department for licenses as Physicians and Surgeons shall be excused from taking the clinical test.
- 6. An applicant for registration as Physician and Surgeon who has been unsuccessful in five examinations will be deemed to be eligible for further examination upon receipt of proof that he has conpleted one year of residency training in an approved hospital training program in the United States received subsequent to the applicant's fifth failure.
- 7. An applicant who has been unsuccessful in five examinations for registration as a drugless practitioner will be eligible for reexamination upon receipt of proof that he has completed a course of study of 960 hours in a school which is accredited under the Medical Practice Act. This course must be received subsequent to the applicant's fifth failure.
- 8. An applicant who furnished proof of a course of study of 240 hours in a school of chiropractic recognized by the Department in order to be eligible for further examination under Section 9a of the Medical Practice Act will be considered as a new applicant and his grades of 75 per cent or more will be carried over to the second and third examinations.

RULE VI-RECIPROCITY

- 1. Each applicant for registration through reciprocity, either for the practice of medicine in all of its branches or for the treatment of human ailments without the use of drugs or medicine and without operative surgery, filed on forms provided by the Department, will be considered on its individual merits, provided the state or territory of original licensure grants a like privilege to persons licensed in Illinois.
- 2. If the application is not endorsed by officers of a state or county society it must be endorsed by two (2) physicians duly licensed to practice in some state in the United States.
- 3. Applicants for licensure through reciprocity or upon the basis of having passed the National Board Examination must pass a clinical test. If the applicant passed Part III of the National Board prior to January 1, 1964, he is required to pass the clinical test conducted by this department. Applicants on the basis of the National Board examination who completed Part III after January 1, 1964, are required to report for an interview with the Medical Examining Committee.
- 4. Graduates of Chiropractic colleges whose applications for registration in Illinois by reciprocity are approved, shall be required to pass a written examination in theory in addition to a practical test before the chiropractic examiner.

RULE VII-LICENSURE

- 1. An examinate who successfully completes his medical examination must secure his certificate of licensure within one year from the date of his examination.
- 2. The Department will not issue a duplicate certificate of registration to practice medicine in all of its branches, or to treat human ailments without the use of drugs or medicine and without operative surgery, unless proof satisfactory to the Department and the Committee is presented that the original certificate was destroyed; or in case of change of name when the original certificate is returned for cancellation, together with satisfactory legal proof of such change of name.
- A license to practice medicine in Illinois shall be a requisite for a residency in an Illinois hospital.

RULE VIII—TEMPORY CERTIFICATES OF REGISTRATION

1. Any person not licensed to practice medicine in all of its branches in the State of Illinois who wishes to pursue a program of graduate or specialty or residency training in this State, must be the holder of a Temporary Certificate of Registration issued by the Department under the provisions of Section 11a of the Medical Practice Act of Illinois and in accordance with the provisions of the within Rules.

- 2. Application for a Temporary Certificate must be made on blank forms prepared and furnished by the Department. It must be submitted to the Department together with evidence satisfactory to the Department that applicant meets the requirements of Section 11a of the Illinois Medical Practice Act and that if his application is approved he will be accepted or appointed for the residency training in the hospital designated in such application.
- 3. A Temporary Certificate of Registration will be issued on behalf of an overwise qualified applicant only for residency or specialty training in a hospital situated in this State which is approved by the Department for the purpose of such training. An approved hospital is one which in the judgment of the Department is qualified to offer such training, and which shall comply with the within Rules.
- 4. Written notice of the Department's final action on every application for a Temporary Certificate of Registration shall be given to the applicant and the hospital designated therein; when such application is approved the Temporary Certificate of Registration shall be delivered or mailed to the hospital designated therein and shall be kept in the care and custody of such hospital. The applicant shall not commence such specialty or residency training before he or the hospital receives written notification of approval of his application.
- 5. A Temporary Certificate of Registration shall not be valid for longer than one year after issuance thereof and may be renewed from time to time, in the discretion of the Department, for a period of not more than one year each time. Application for renewal must be made on forms prepared and furnished by the Department and the Temporary Certificate of Registration sought to be renewed must be submitted therewith to the Department.
- 6. When any person in whose behalf a Temporary Certificate of Registration has been issued shall be discharged or shall terminate his specialty or residency training in the hospital designated therein, such hospital shall immediately deliver or mail by registered mail to the Department his Temporary Certificate of Registration and written notice of the reason for return of same.
- 7. A Temporary Certificate of Registration is not transferable without prior notice to and approval by the Department. If the holder of a Temporary Certificate of Registration wishes to change to another training program in the approved hospital designated therein, or he wishes to enter a training program in another approved hospital, he must make application on Forms furnished by the Department. His current Temporary Certificate of Registration must accompany such application and he cannot thereafter continue in the training program designated on such cur-

rent Certificate, and he may not commence such other training program until a Temporary Certificate of Registration has been issued therefor.

- 8. Not more than one Temporary Certificate of Registration shall be issued to any person for the same period of time. A person on whose behalf a Temporary Certificate of Registration has been issued is limited in the practice of medicine to the performing of such acts as may be prescribed by and incidental to his program of residency training in the hospital designated in his Temporary Certificate of Registration, and he cannot otherwise engage in the practice of medicine in the State of Illinois.
- 9. Whenever, under the within Rules, a hospital is required to deliver or return a Temporary Certificate of Registration to the Department, in case, because of the loss or destruction of such Certificate, or for any other reason, such hospital shall be unable immediately so to deliver or mail such Certificate, such hospital shall immediately mail or deliver to the Department a written explanation in detail of such inability.
- 10. The Department shall not accept any application for a Temporary Certificate of Registration on behalf of an applicant who has a pending application on file to take the Department examination for a license to practice medicine in all its branches in the State of Illinois, or an applicant who has previously taken and failed such Department examination.
- 11. The holder of a Temporary Certificate of Registration is not barred thereby from becoming eligible for admission to the Department examination for a license to practice medicine in Illinois if he otherwise meets the requirements for admission to such examination and if such person should fail to pass such examination such failure shall not bar him from completing his training program; provided, that if such person shall leave or terminate his training program, this forgoing Rule 10 shall apply and he shall not thereafter be eligible for another Temporary Certificate of Registration.

RULE IX-LIMITED LICENSES TO PRACTICE IN STATE HOSPITALS

- 1. Each application made on forms provided by the Department will be considered on its own merits.
- 2. The State Hospital at which the applicant will practice under the supervision of a medical officer, shall signify to the Department that the

hospital will appoint the applicant in the event he received a Limited License.

3. Any applicant for a Limited License who has failed in more than three examinations for licensure under the Illinois Medical Practice Act shall not be eligible for a Limited License.

Other Examining Boards

Other examining boards operating under the jurisdiction of the Department of Registration and Education are:

Chiropodists

Dr. A. C. Arnette, Peoria

Dr. Charles H. Delano, Springfield

Dr. Theodore S. Hollingsworth, Oak Lawn

Optometrists

Dr. James K. Finley, Decatur

Dr. Thomas M. McGuire, Chicago

Dr. Clarence J. Strobel, Chicago

Dr. Wayne B. Cox, Edwardsville Dentists

Dr. Eugene E. Ausbrook, East St. Louis

Dr. Hugh D. Burke, Dixon

Dr. Carl Greenwald, Chicago

Dr. Jacob Gerchgall, Chicago

Dr. Robert I. Humphrey, Chicago

Dr. William Podesta, Mattoon

Dr. William O. Vopata, Riverside

Physical Therapists

Miss Mildred Andrews, Hines

Miss Vilma Evans, Danville

James Gray, Springfield

H. Worley Kendell, M.D., Peoria Frank Pierson, Peoria

Psychologists

Dr. Philip Ash, Chicago

Dr. Roy Brener, Hines Dr. Leroy Wauch, Chicago

Pharmacists

Milton G. Christy, Pekin Joseph Davidson, Carrollton

Dr. James E. Gearien, Chicago

Aloysius J. Niezgodski, Chicago

Harold W. Pratt, Des Plaines Benjamin B. Rosen, Chicago

David W. Watt, Springfield

Nurses

Miss Eleanor Carlson, Chicago

Miss Marion Lennan, Chicago

Miss Dona M. Herbst, Tinley Park

Dr. Annette Lefkowitz, DeKalb

Sister M. Francis, OSF, Springfield

Illinois Association Of The Professions

The Illinois Association of the Professions is a nonprofit corporation, incorporated under the laws of Illinois on Feb. 6, 1964. Several other states such as Michigan, New York and North Carolina have already organized associations of professions with the same basic structure and purpose and an American Association of the Professions has been incorporated.

The IAP was created to provide the organizational machinery whereby the combined strength and counsel of all professions can be utilized for the advancement of professional ideals and the promotion of professional welfare. This should strengthen the traditional rights, privileges and responsibilities of each profession. At the same time, it should also provide more effectively to the people adequate professional services based on skill and integrity.

The close relationships between members of the professions place them in a better position to be "molders of public policy." The IAP will devise ways and means of better utilizing the professional knowledge and skills of its members for the benefit of society and attempt to create the kind of relations between the professions which will most effectively accomplish this objective.

IAP is *not* a political organization. It is nonpartisan. But it serves its members as one practical medium of communication between the professions and legislative bodies.

IAP supplements efforts, programs and services of the individual state professional societies. The professional societies must function for the profession each represents.

The IAP benefits the individual member by helping him protect and perpetuate the individual privileges and responsibilities of the professional person. It serves as a medium of communication between the professions, devoting its activities to professional relations, public relations, legislation, education, and business services.

Through the cooperation of the professions in Illinois, who are members of the IAP, legislation in the name of HB 2432 was enacted in the 75th General Assembly and approved by Governor

Otto Kerner. This legislation creates a "Division of Professional Supervision" in the Department of Registration and Education.

Eight state professional societies are Charter Members of the IAP.

Illinois Council of The American Institute of Architects.

Illinois State Dental Society.

Illinois Society of Certified Public Accountants.

Illinois Society of Professional Engineers.

Illinois State Medical Society.

Illinois Pharmaceutical Association.

Illinois State Veterinary Medical Association.

Illinois State Bar Association.

Admission of other professional societies to membership is provided for in the IAP bylaws.

The IAP is governed by a board of directors. On that board recognition, rather than control, is accorded those professions having larger numbers of individual members. IAP bylaws provide that the board of directors of each state organization shall designate two of its members, who are also members of IAP, to serve as directors. In addition to those thus provided, Directors are also elected from the general membership at the IAP Annual Meeting.

Annual dues for an individual member in IAP is \$10. Annual dues for a professional society organization is \$100. Applications and checks are accepted by the executive secretary of state professional associations for processing.

IAP is a "horizontal" type of organization established to answer some of the professional's problems just as other segments of society are organized. Labor, for example, has the AFL-CIO—cutting across all trades on an industry-wide basis. State and national Chambers of Commerce were created for business and the American Federation of Farm Bureaus, one of the greatest forces in our nation, is the voice of farming.

Medical Legal Information

LEGAL SERVICES OF ISMS

The Illinois State Medical Society retains a General counsel and occasionally uses the services of special counsel in implementing its various programs. Legal advice is given to the state society and its components as organizations, but is not available to individual members.

The legal department of the Society can answer specific questions propounded by officers of county

medical societies in Illinois, which are part of and make up the state society, if the questions are of interest to the membership as a whole.

Although the Society and its counsel cannot provide personal advice to ISMS members, it is to every physician's advantage to acquaint himself with as much general medical-legal knowledge as possible. The following section, therefore, is devoted to this kind of information.

HOW TO SET YOUR AFFAIRS IN ORDER

A physician's death, expected or not, often creates burdensome tasks for survivors. Natural grief is complicated by the necessity for rapid decisions and hurried searches for required information. Significant papers may be so well put away that prolonged seeking in various places may be required, with added pain for the bereaved.

It is therefore suggested that the physician, during his lifetime, ease the situation by compiling in one place needed information about the location of important records and papers. In addition, the Illinois State Medical Society urges each member to have a will prepared by a competent attorney and to have the said will re-evaluated by an attorney whenever there is a material change in any conditions.

The executor named in the will can handle the doctor's estate most efficiently if he has access to specific information.

The physician should, of course, leave information about insurance, real estate, and bank accounts just as everyone else does, but he has additional responsibilities peculiar to his profession. He should leave instructions for:

- 1. Temporary coverage of his practice. Some arrangement with a colleague should be made immediately for hospitalized patients and others should be notified of the doctor's death.
- 2. Patient records, which should be carefully preserved for a minimum of 10 years and for 25 years, if possible. Contents of the records should be turned over to another physician upon written request.
- 3. Return of unused narcotics to the Treasury Department, the narcotics tax stamp and order book to the Internal Revenue Service, and retention of the narcotics ledger for two years.
- 4. Disposal of his practice. If it is to be sold, rapid action is advised as value is lost quickly. Equipment is best disposed of with the sale of the practice.
- 5. Benefits that may be due survivors from unused insurance premiums, Blue Cross-Blue Shield, Veterans Administration, or Social Security.

As soon as practical after death, the attorney who will handle the estate should be contacted and his advice followed thereafter.

LEGAL LIABILITY OF PHYSICIANS

The legal liability of physicians is a question on which much has been written. It has also been the topic of discussion at many meetings of medical and medical-legal groups. However, because of the grave nature of the problem, the Illinois State Medical Society's legal counsel believes that the subject cannot be overemphasized.

Statistics prove that the number of malpractice and general liability suits against physicians is on the increase. This does not mean that physicians are becoming less skillful or more careless in their diagnosis and treatment; it probably means that physicians are being affected by the tremendous growth there has been recently in all types of personal injury litigation.

More people than ever before are receiving medical attention and more are starting lawsuits against physicians when recovery is less than complete.

Liability Insurance

For this reason, it is essential that every physician carry liability insurance to protect him against all possible claims. The physician should be aware, however, that there are some inadequate policies on the market today and an attorney should be consulted before contracting for insurance that may not cover the doctor's particular circumstance. Additional coverage insofar as limits are concerned is relatively inexpensive and should be carried in sufficient amount to cover all possibilities.

A physician today is a "sitting duck" for a lawsuit even though he may in no way be guilty of negligence. And lawsuits to defend, no matter how meritorious, require the expenditure of time and money.

Legal implications in this field are wide, but basically the physician is liable for his own negligent acts and the negligent acts of all his employees. In the case of a partnership, he is also liable for the negligent acts of his partners.

While the right kind of insurance in sufficient amount will protect the physician financially, steps should be taken by all doctors to help minimize the filing of lawsuits of this kind and to work for reduction in the number of guilty verdicts being obtained.

The American Medical Association has prepared, and has available for distribution, several interesting pamphlets and papers on this subject. The pamphlet entitled, "Professional Liability and the Physician," reprinted from the February 1963 issue of the Journal of the American Medical Association, contains this statement:

Physician's Responsibility

"In the final analysis, the physician himself must share the responsibility for the continuing existence of the unpleasant professional liability situation. Many physicians have been satisfied to pay their professional liability insurance premiums and thereafter to sit back complacently, doing nothing until they become a target. Every physician must be brought to realize that this money payment is only part of his insurance program; a much more important part is his contribution of time, study, and attention to put into effect all possible measures to safeguard the patient, himself, and his colleagues. Professional liability is in no sense merely an insurance problem. It is a medical problem and must be combatted by members of the medical profession."

The AMA phamphlet goes on to say that "prevention is the best possible defense against claims and suits" and lists these 21 prevention "commandments":

- 1. The physician must care for every patient with scrupulous attention given to the requirements of good medical practice.
- 2. The physician must know and exercise his legal duty to the patient.
- 3. The physician must avoid destructive and unethical criticism of the work of other physicians.
- 4. The physician must keep records which clearly show what was done and when it was done, which clearly indicate that nothing was neglected, and which demonstrate that the care given met fully the standards demanded by the law. If any patient discontinues treatment before he should, or fails to follow instructions, the records should show it; a good method is to preserve a carbon copy of the physician's letter advising the patient against the unwise course.
- 5. The physician must avoid making any statement which constitutes, or might be construed as constituting an admission of fault on his part. He should instruct employees to make no such statements.
- 6. The physician must exercise tact as well as professional ability in handling his patients, and should insist on a professional consultation if the patient is not doing well, if the patient is unhappy and complaining, or if the family's attitude indicates dissatisfaction.
- 7. The physician must refrain from over-optimistic prognoses.
- 8. The physician must advise his patients of any intended absences from practice and recommend, or make available, a qualified substitute. The patient must not be abandoned.
- 9. The physician must unfailingly secure an "informed" consent (preferably in writing) for medical and surgical procedures and for autopsy.
- 10. The physician must carefully select and supervise assistants and employees and take great care in delegating duties to them.
- 11. The Physician should limit his practice to those fields which are well within his qualifications.
- 12. The physician must frequently check the condition of his equipment and make use of every available safety installation.

13. The physician should make every effort to reach an understanding with his patient in the matter of fees, preferably in advance of treatment.

14. The physician must realize that it is dangerous to diagnose or prescribe by telephone.

15. The physician should not sterilize a patient solely for the patient's convenience except after a reasonably complete explanation of the procedure and its risks and possible complications and after obtaining a signed consent from the patient and from the patient's spouse if the patient is married. Such sterilization is a crime in Connecticut, Kansas, and Utah and should not be performed in those states. Eugenic sterilization should be performed only in conformity with the law of the state, if any. Sterilization for therapeutic purposes may lawfully be performed with the informed consent of the patient and preferably with the informed consent of the patient and preferably with the informed consent of the patient's spouse, if the patient is married.

16. Except in an actual emergency situation which makes it impossible to avoid doing so, a male physician should not examine a female patient unless an assistant or nurse, or a member of the patient's family is present.

17. The physician should exhaust all reasonable methods of securing diagnosis before embarking upon a therapeutic course.

18. The physician should use conservative and less dangerous methods of diagnosis and treatment wherever possible, in preference to highly toxic agents or dangerous surgical procedures.

19. The physician should read the manufacturer's brochure accompanying a toxic agent to be used for diagnostic or therapeutic purposes, and, in addition, should ascertain the customary dosage or usage in his area.

20. The physician should be aware of all the known toxic reactions to any drug he uses, together with the proper methods for treating such reactions.

Physician and Hospital Liens

Paragraph 101.1 of Chapter 82, Illinois Revised Statutes 1965, provides that every licensed physician practicing in the State of Illinois who renders service to an injured person, except services rendered under the provisions of the Workmen's Compensation Act, shall have a lien upon all claims and causes of action for the amount of his reasonable charges up to one-third of the sum recovered by the injured person. In order to effectuate this lien, notice in writing must be given to the injured person and also to the person or persons against whom such claim or right of action exists.

Under paragraph 97 of Chapter 82, Illinois Revised Statutes 1965, not-for-profit hospitals and those hospitals maintained by a county shall have a lien on all claims or causes of action for the amount of reasonable charges at ward rates up to one-third of the amount recovered. Again,

in order to perfect the lien, it must be filed in the same manner as the physician's lien described above.

While the language is substantially the same under both liens, they are entirely separate enactments, neither is subservient to the other and, therefore, both the hospitals and the physicians can recover up to one-third of the amount received by the patient.

Admissibility in Evidence of Deliberations of Tissue Committees

In 1961 the Illinois legislature passed an act in which one of the purposes was to prevent the admissibility in evidence and making public the deliberations and findings of tissue committees. The act is set out at paragraphs 101-105 of Chapter 51, Illinois Revised Statutes 1965, and is as follows:

"101. All information, interviews, reports, statements, memoranda or other data of the Illinois Department of Public Health, Illinois State Medical Society, allied medical societies, or inhospital staff committees or accredited hospitals, but not the original medical records pertaining to the patient, used in the course of medical study of the purpose of reducing morbidity or mortality shall be strictly confidential and shall be used only for medical research.

102. Such information, records, reports, statements, notes, memoranda, or other data, shall not be admissible as evidence in any action of any kind in any court or before any tribunal, board, agency or person.

103. The furnishings of such information in the course of a research project to the Illinois Department of Public Health, Illinois State Medical Society, allied medical societies, or to in-hospital staff committees or their authorized representatives, shall not subject any person, hospital, sanitarium, nursing or rest home or any such agency to any action for damages or other relief.

104. No patient, patient's relatives, or patient's friends named in any medical study, shall be interviewed for the purpose of such study, unless consent of the attending physician and surgeon is first obtained.

105. The disclosure of any information, records, reports, statements, notes, memoranda or other data obtained in any such medical study except that necessary for the purpose of the specific study is unlawful, and any person convicted of violating any of the provisions of this Act is guilty of a misdemeanor."

While there have been no decisions under the act quoted by any of the Illinois appellate courts or the Supreme Court, it would appear that a tissue committee would come within the meaning of "inhospital staff committees of accredited hospitals," and, therefore, would be inadmissible in evidence and considered private and confidential. Unfortunately, the act does not define accredited hospitals, but this would probably mean either

licensed hospitals or those accredited by the medical professions. (There are only 10 licensed hospitals in Illinois which have not been accredited by the medical professions.)

In addition to the above statute, the fact that tissue committees are not required by Illinois law, but are established through the voluntary co-operation of the hospitals and the medical profession for the betterment of medicine through research of prior cases, would be a powerful argument against admissibility.

Another legal argument against the introduction in evidence of such records would be the fact that the results would be the deliberations of a committee and there would be no way to cross-examine a committee, which would mean that a fundamental right was being lost by one or more of the litigants in the case.

As stated above, there are no decisions in Illinois which can be relied upon, but it is the opinion of the ISMS general counsel that such records cannot legally be used in any legal action.

It should be pointed out that in most instances subpoenas and subpoenas duces tecum (produce the records) are issued by the clerk of the court on application of one of the parties litigants and no determination is made as to the admissibility of the testimony or records until the witnesses and records are produced in court. It is suggested that if a subponea or court order is ever received involving the records and deliberations of the tissue committee, your attorney be immediately contacted in order to file appropriate motions to suppress the production of the records. If the trial court should hold that such records are admissible, it is then suggested that an appeal be made to the Supreme Court of Illinois on this question, for if such records are produced, it could conceivably have the result of diminishing the efficiency or the ultimate abandonment of such committees, with the result that research and advancement in the art of medicine would be retarded.

Consent by Minors to Medical Treatment and Operations

The general law in Illinois is that a minor cannot give legal consent or waive any rights which he has under the law. In the year 1961, the Illinois legislature made an exception to this rule by specifically providing that consent to the performance of medical or surgical treatment by a licensed physician could be executed by a married person who is a minor or a pregnant woman who is a minor and shall not be voidable because of such minority. This act further provides that any parent who is a minor may consent to the performance upon his or her child of medical or surgical procedures by a licensed physician and that the consent shall not be voidable because of such minority.

The act referred to above is set out at paragraphs 18.1 and 18.2 of Chapter 91, Illinois Revised Statutes 1965.

Employment Contract Between Physician and Patient

The relationship between a physician and a patient is one of contractual relationship and, therefore, a physician is under no legal requirement to accept anyone as a patient unless he so desires. This rule is true in the case of an emergency even though no other physician is available.

Legally, a physician has the right to refuse treatment in the case of an accident or other emergency and could not in any way be held liable for refusing to administer aid. (This is strictly the legal answer and does not involve the moral or ethical question.) The rendering of such services as may be necessary in the case of an emergency does not of itself give rise to the relationship of physician and patient and the physician is under no obligation to continue treatment beyond the emergency.

The physician in rendering emergency treatment, however, must use the same degree of skill and care, as required in other cases, taking into consideration conditions at the scene of the accident.

Continuation of Treatment

A physician or surgeon, on undertaking an operation or treatment, is under the duty, in the absence of an agreement limiting the service, of continuing his attendance, after the operation or first treatments, as long as the case requires attention; and a surgeon, in his treatment subsequent to an operation, is required to exercise reasonable and ordinary skill and care.

The failure to give needed continued care under an obligation to do so constitutes negligence or malpractice. The obligation of continuing attention can be terminated only by the cessation of the necessity which gave rise to the relationship of physician and patient, by mutual consent of the parties, by the discharge of the physician by the patient, or by the physician's withdrawing from the case after giving the patient reasonable notice so as to enable him to secure other medical attendance.

A physician has the legal right to withdraw from a case if the patient breaks the contract by failure to follow the medical advice or treatment and direction of the physician, but the relationship cannot be terminated until the physician has advised the patient of his withdrawal from the case and has allowed the patient a reasonable length of time to procure another doctor.

Written Notice

What is reasonable notice to the patient depends upon the circumstances of each case. Factors which must be taken into consideration are the condition of the patient, the size of the community, and the availability of other physicians. In order to be completely safe, prior to withdrawal from the case, the physician should advise the patient in writing of his intent to with-

draw, his reasons therefor, and the fact that he will make available the patient's case history and information regarding diagnosis and treatment to the new physician when selected by the patient. Should the patient return to the original physician stating that he has been unable to procure other medical aid, treatment should not be refused until a replacement has been obtained.

A physician has the right to leave his practice temporarily if he makes provisions for the attendance of a competent physician during his absence. This notice, which again preferably should be in writing, should be in sufficient time so that the patients can obtain replacements of their own choice if they do not desire to consult the physician temporarily handling the practice of the absent physician.

GOOD SAMARITAN BILL

The 1965 Legislature passed and the Governor signed Senate Bill 395, the so-called "Good Samaritan Bill." This bill provides that any physician who, in good faith, provides emergency care without a fee at the scene of a motor vehicle accident or in case of nuclear attack shall not as a result of his acts or omissions, except in the case of gross willful or wanton negligence, be liable for damages. Paragraph 2a of Chapter 91, Illinois Revised Statutes, 1965.

The physician in rendering emergency treatment other than that necessitated by motor vehicle accidents or nuclear explosions must use the same degree of skill and care as required in other cases, taking into consideration conditions at the scene of the accident.

CONSUMER FRAUD ACT

This act is designed to protect the consumer. In part it reads,—"The act, use or employment by any person of any deception, fraud, false pretense, false promise, misrepresentation, or the concealment, suppression, or omission of any material fact with intent that others rely upon such concealment, suppression or omission, in connection with the sale or advertisement of any merchandise, whether or not any person has in fact been misled, deceived or damaged thereby, is declared to be an unlawful practice." The term merchandise includes any objects, wares, goods, commodities, intangibles, real estate, or services.

COMMITMENT OF PATIENTS TO MENTAL HOSPITALS

The State of Illinois adopted in 1963 a Mental Health Act which went into effect July 1, 1964, which Act is set out under Chapter 91½, Articles III through IX, Illinois Revised Statutes 1965.

Under the provisions of this Act and the Youth Commission Act, there are seven ways in which an individual may be admitted to a mental hospital.

- 1. Informal admission
- 2. Voluntary application for admission
- 3. Admission on certificate of one physician
- 4. Admission on certificate of two physicians
- 5. Hospitalization upon court order
- 6. Emergency admission, except for mentally retarded persons
- 7. Special procedures by the Youth Commission

Informal admission:

Any person, as to admission for mental illness to a state hospital, may be admitted without formal application if the superintendent, after examination, deems the person suitable. Such patient is to be released on his request at any time between the hours of 9 a.m. and 5 p.m. and he is to be advised of such right when he is admitted. This section does not apply to the person who is a patient of a physician and is admitted to a licensed private hospital or the psychiatric unit of a general hospital under the supervision of such physician.

Voluntary application for admission:

Any person who is mentally retarded or in need of mental treatment or is alleged to be in need of mental treatment or being mentally retarded may be admitted to a hospital if, in the judgment of the superintendent, such person is a proper subject for voluntary admission after application has been filed, with the application being presented by the person himself or his attorney or relative with his consent or if a minor, by his parent or guardian. Upon this type of admission, the patient has the right to leave the hospital 15 days after having given notice in writing of his desire to leave and upon admission the patient shall be advised both orally and in writing of this right of release. The advice so given is given to the patient and his relatives, parents, guardian or attorney if any such accompany the patient to the hospital. However, this release in 15 days may not take place in such period if a petition for hospitalization upon court order is filed within such 15 days period.

The patient also may be discharged by act of the superintendent.

While the voluntary patient and those admitted on certificate of one physician or upon certificate of two physicians may be restrained and given such standard treatment as fits the patient's welfare, no surgery may be performed except by consent of the patient or the parent or guardian. Admission on certificate of one physician:

The superintendent of a mental hospital may receive and detain as a patient any person alleged to be in need of mental treatment who does not object thereto upon the application signed by a proper relative of the patient or peace or health officer or an officer of any proper charitable or proper welfare institution or by the superintendent of a hospital operated by the state or a political subdivision thereof, or by a friend of the patient together with the certificate of one examin-

ing physician executed within 10 days prior to such admission. Prior to admission the superintendent of the mental hospital shall cause the patient to be again examined in order to confirm the need for hospitalization. If the hospital determines within 15 days after admission that the patient should be detained for further care and treatment and the patient does not agree to remain in the hospital as a voluntary patient, the certificate of another examining physician supporting the application is required.

Admission on certificate of two physicians:

The same general procedure is followed here as in the case of one physician, except that the consent of the patient is not required, but within five days after his admission he shall consult at the hospital with a magistrate or other judicial officer, at which time he shall be advised of his right to hearing, at which hearing he must be represented by counsel and may present evidence. After admission the patient is forthwith to be examined by some other physician than said two physicians and must be found to be in need of treatment. The patient also has a right to further hearing any time prior to expiration of 60 days from his admission. If this is not asked, the superintendent must arrange in said period to have a hearing. Other provisions also provide for further periodical review of need for hospitalization.

Hospitalization upon court order:

Whenever any person shall be, or supposed to be, mentally retarded or in need of mental treatment, any reputable citizen of this state may file in the Circuit Court the verified petition alleging that the individual is in need of mental treatment and that he be admitted to, and confined to, a hospital for the mentally ill. Upon the filing of the petition the court shall have power to make necessary temporary orders of restraint and a hearing shall be had after an examination has been made by a physician or psychologist appointed by the court. At the hearing the patient may be represented by counsel and has the right to a trial by a jury of six. When the patient demands a jury, one of the six members shall be a physician or a psychiatrist dependent upon question of mental treatment or mental retardation.

Emergency admission, detention:

Whenever a petition is filed in the Circuit Court by a reputable citizen alleging that the condition of an individual is such that immediate restraint is necessary, which petition is accompanied by a certificate of a physician, the individual may be confined in a mental hospital for a period not exceeding 15 days.

This new Mental Health Act not only appears to contain adequate provisions for the confinement of mental cases, but also provides sufficient safeguards so that an individual cannot be wrongfully restrained for an undue period of time. In fact, it would seem remote that abuses would happen under the numerous safeguards provided. As an example, any advice as to the rights of the patient must be given in a language with which the patient is familiar.

The State's Attorney of each county is charged with the responsibility of the enforcement and operation of this Act and this is the office which should be contacted by the physician when dealing with mental patients. The clerks of the courts concerned have been furnished forms to be employed under the Act and it is provided that all forms shall comply substantially with those so furnished so that it is obvious that one should employ the same.

INTERNAL REVENUE CODE

It should be evident to the busy physician that it is just as unwise for him to be his own tax consultant as it is for every man to be his own doctor. The physician is well aware that in seeking to keep abreast of all of the ramifications and developments of modern medicine, he has a burden that is becoming increasingly difficult to sustain and that he has very little time to devote to subjects as complex as taxation, which is rightfully the province of his accountant and lawyer.

Taxation in the United States is complex and many tax matters have no particular application to the medical profession as such. However, the doctor as a citizen should be aware that he is greatly affected by a subject so varied and so complicated that the statutes themselves require some 1,500 pages to be set forth. And he should know that sections 1(a) through 8023(b) are printed in a size of type that should be of some benefit in fees to practioners who concern themselves with the human eye. Surely the point that physicians are well advised to place their problems with accounting and legal advisors is further exemplified by such facts as the following:

Regulations implementing the Internal Revenue Act require some 9,700 pages for them to be spelled out and that, in order to designate the different regulations, the government needs to entitle the regulations as Regulation Section 1.0-1 through Regulation Section 301.770-11.

Just as the patient would be so much better served if he saw his doctor regularly before difficulties become advanced, so the physician's interests would be better served if he would seek advice on income and estate tax problems before the fact, rather than after problems have arisen.

PROCEDURES AND REPORTS IN CONTROL OF NARCOTIC DRUGS

Physicians are subject to control by both the state of Illinois and the federal government in relation to narcotic drugs. The numerous provisions of the federal regulations are set forth in a fairly lengthy pamphlet entitled, "Regulations No. 5 Relating to the Importation, Manufacture, Production, Sale, etc., of Opium, Coca Leaves,

Isonipecaine or Opiates," which was reprinted April 1, 1957, and is available at a cost of 45 cents through the Superintendent of Documents, U. S. Government Printing Office, Washington, D. C. This is published by the Bureau of Narcotics of the U. S. Treasury Department.

The state of Illinois' "Uniform Narcotic Drug Act" has been in effect since Jan. 1, 1958. It is found in paragraphs 22-1 through 22-49, inclusive, Chapter 38 of Illinois Revised Statutes, 1965. The Division of Narcotic Control's current rules and regulations to implement the Act have been in effect since Apr. 1, 1960. They cover such matters as prescriptions and official forms therefor, emergencies excusing use of other than official prescription forms, reporting of loss or theft of such prescription blanks, records to be kept by the physician, dispensing of hypodermic syringes and needles, prescribing procedures in hospitals, and other subjects related to narcotic drugs. The Act and the rules and regulations are available at no cost through the Division of Narcotic Control, 623 E. Adams St., Springfield.

Further, the state of Illinois has had in effect since Jan. 1, 1960, a "Uniform Drug, Device and Cosmetic Act." Its rules and regulations control such things as the keeping of adequate records, for a period of two years, of all purchases and dispositions of dangerous drugs as such drugs are defined by the Act. A publication containing the Act and the pursuant rules and regulations is also available through the Division of Narcotic Control in Springfield.

All physicians are urged to have in their possession copies of both the state and federal narcotics control acts and the rules and regulations implementing them. As these laws and regulations are changed from time to time, every effort should be made to have the current rules handy.

PROCEDURES AND REPORTS AS TO COMMUNICABLE DISEASES

In order to be conversant with the presently governing rules and regulations as to the control of communicable diseases and the physician's duties as to reports and procedures in relation to these afflictions, it is suggested that the physician apply to the Department of Public Health of the State of Illinois at Room 500, State Office Building, Springfield, for the publication entitled, "Rules and Regulations for the Control of Communicable Diseases," which was revised July 1, 1959.

HOW TO WILL YOUR BODY OR ANY PORTION THEREOF TO SCIENCE

The law in the State of Illinois as to the right of an individual to leave his body or particular parts thereof to science by will or agreement is not at all clear. While there are instances of medical science receiving dead bodies or parts thereof under provisions in wills and agreements made prior to death, such disposition has never been passed upon by the Illinois courts of last resort. There is no statutory authority in Illinois specifically providing for such disposition and it was planned, upon the advice of the ISMS counsel, to introduce a bill in the 1965 session of the legislature to specifically authorize this procedure. This suggestion was deferred due to the fact that the subject matter would have been controversial and it was felt that with the many built-in disagreements and differences of opinion in this session, it might be better policy to wait until an appropriate time.

Illinois does have an Act covering deceased bodies which are to be buried at public expense. These bodies may, under certain conditions, be used for advancement of medical science. The Act is set forth in paragraph 19, Chapter 91, Illinois Revised Statutes 1965, and is as follows:

"Superintendents of penitentiaries, houses of correction and bridewells, hospitals, state charitable institutions and county homes, coroners, sheriffs, jailors, funeral directors and all other state, county, town and city officers, in whose custory the body of any deceased person, required to be buried at public expense, shall, in the absence of disposition of such body, or any part thereof by will or other written instrument, give permission to any physician or surgeon licensed in Illinois, or to any medical college or school, or other institution of higher science, education or school of mortuary science, public or private, of any city, town or county, upon his or their receipt in writing or request therefor, to receive and remove free of public charge or expense, after having given proper notice to relatives or guardians of the deceased, the bodies of such deceased persons about to be buried at public expense, to be by him or them used within the state, for advancement of medical, anatomical, biological or mortuary science. Preference shall be given to medical colleges or schools, public or private and such bodies to be distributed to and among the same, equitably, the number assigned to each, being in proportion to the students of each college or school: except, if any person claiming to be, and satisfying the proper authorities that he is of kindred of the deceased asks to have the body for burial, it shall, in the absence of other disposition of such body, or any part thereof by will, court order, or other written instrument, be surrendered for interment. Any medical college or school, or other institution of higher science education or school of mortuary science, public and private, or any officers of the same, that receive the bodies of deceased persons for the purposes of scientific study, under the provisions of this Act, shall furnish the same to students of medicine, surgery, and biological or mortuary sciences, who are under their instruction, at a price not exceeding the sum of \$5.00 for each and every such deceased body so furnished."

It should be noted that in the above law it is

provided that disposition shall be made only in case the deceased has not specifically made disposition by his will or other written instrument. This would tend to support an argument that the deceased does have the right to dispose of his body as he sees fit, but to make it completely clear a new act specifically giving this power should, if possible, be adopted by the legislature.

The rather recent discovery that certain parts may be removed from a dead body and used in a living person has greatly increased the need for cadavers and parts thereof. Any one wishing to make a donation should so provide by his will and notify the institution to receive the body, or any part thereof, of this provision in his will and also notify the executor of the will and his next of kin, or whoever is the most likely to be notified immediately of his death, for time is of the essence in the case of transplants.

AUTOPSY

In Illinois, the heirs and next of kin can bring an action for mutilation of the body in those cases where an autopsy is performed without authority or permission. In order to avoid the possibility of liability, autopsies should only be performed, in Illinois, when ordered by the coroner or upon written consent given by the next of kin. The coroner may order an autopsy directly against the wishes of the next of kin.

THE MEDICAL WITNESS

It is difficult to find a field of law in which expert evidence is of greater importance than the testimony of the physician in accident cases. The carnage and mutilation on highways alone result in many thousands of lawsuits a year and the busy physician finds that attending court is a burden that often cannot be avoided.

There may be hope that the growing use of depositions will reduce some of the load from both physicians and attorneys as disclosure of evidence through deposition is likely to result in settlement before a case is brought to trial. Nevertheless, all signs indicate that the average practitioner can expect an increase in the number of times he will be called upon as an expert witness in the coming years.

It is suggested that, if the physician wishes to better prepare himself as to medical jurisprudence, there are a number of sources which can give him an insight into what he may expect in the forum and give him greater confidence as to this aspect of his practice. Such sources, without even the suggestion that the following begin to exhaust a listing are:

- 1. Doctor and Patient and the Law, by Attorney C. Joseph Stetler and Alan R. Moritz, M.D., Director of the Institute of Pathology at Western Reserve University, Fourth Edition, published in 1962 by The C. V. Mosby Company of St. Louis.
- 2. Chapter III on Evidence in Law in Medical and Dental Practice by Lott and Gray, published

in 1942 by The Foundation Press of Chicago.

3. Medical Trial Technique by Attorney Irving Goldstein and Willard Shabat, M.D., published in 1942 by Callaghan and Company of Chicago.

4. Lawyers Medical Cyclopedia of Personal Injuries and Allied Specialties, which consists of seven volumes and is an elaborate treatment of the subject; published in 1962 by The Allen Smith Company of Indianapolis.

5. The Rights and Rewards of the Medical Witness by Nordstrom, published in 1962 by Thomas Publishing Company of Springfield.

INTERPROFESSIONAL CODE FOR PHYSICIANS AND LAWYERS OF ILLINOIS

The following Interprofessional Code for Physicians and Lawyers of Illinois was drafted by a Special Committee on Medical-Legal Cooperation of the Illinois State Bar Association and the Liaison Committee of the Illinois State Medical Society to serve as a guide to physicians and lawyers. It has been approved by the governing board of both the Illinois State Bar Association and the Illinois State Medical Society.

Preamble

The purposes of this Code are to establish standards of practice and of ethical conduct for physicians and lawyers in those areas in civil cases where there is and will continue to be an interrelationship of medicine and law, and thereby to improve the practical working relationships of the two professions, to protect the legitimate interests and the rights of the patient-client, of the physician, the lawyer, and of society, and thereby to help advance the more effective administration of justice.

The provisions of the Code constitute recognition that the members of each profession have an obligation not only to the individual who obtains their advice and assistance but also to the community and society as a whole, and to all other members of their own professions. The objectives of the Code can be achieved only if the members of both professions acquaint themselves with these standards of practice and follow them, subject to rules of law and principles of medical and legal ethics.

ARTICLE I ATTENDING PHYSICIAN'S MEDICAL REPORTS AND CONFERENCES

Purpose of Physician's Report

1. Information relative to an attending physician's treatment of a patient whose physical or mental condition is an issue in litigation is of prime importance to the parties involved in litigation. To properly prepare his client's case for trial and to be in a position to properly represent his client in settlement negotiations, the patient's lawyer has the duty of acquiring pertinent information

from the attending physician. During the course of litigation, it becames necessary for the lawyer to correspond with and confer with his client's physician and to obtain written reports from the physician.

Keep Complete Records

2. The attending physician should prepare, keep and preserve full and complete records of his examination, diagnostic findings (laboratory), and treatment of the patient.

Request for Report

- 3. When a medical report is desired by the lawyer, he should make a written request for it from the attending physician, and this request should be accompanied by a written authorization from the client for the release of the information sought from the client's physician. The request should ask the physician to give the following specific information:
 - (a) History of the occurrence leading to the injury or condition, as given by the patient to the physician.
 - (b) Pertinent subjective complaints elicited from the patient.
 - (c) Pertinent objective findings made by the physician throughout the course of treatment.
 - (d) The physician's diagnosis.
 - (e) Interpretation of x-rays, electroencephalograms, electromyograms, and any and all other pertinent data used in the treatment and diagnosis (source and interpretation should be stated).
 - (f) Treatment rendered by the physician to the patient.
 - (g) The physician's opinion as to whether there is permanent residual from the injury or condition and the extent thereof.
 - (h) The prognosis.
 - (i) The physician's opinion as to the necessity of further medical or surgical treatment.

The request for a report should be accompanied by a statement that the lawyer will endeavor to provide for the payment of the physician's fees out of any settlement or satisfaction of judgment.

The Physician's Report

4. The physician has the obligation to cooperate with his patient's lawyer and should as soon as practicable after receiving the request for it supply the patient's lawyer with a written report. This report should be clear and concise and should contain specific responses to the elements enumerated in the lawyer's request for a report. In preparing the report, the physician should examine his own records and where practicable, the records of any hospital he deems necessary pertaining to the treatment of the patient.

The attending physician should not give written or oral reports concerning his patient to attorneys, adjusters, or investigators representing parties whose interests are adverse to those of the patient without express written authorization from the patient.

Report Should Be Complete

5. The report to the lawyer should be objective, impartial and complete. The attending physician should not give, and should not be asked to give a report that does not comply with these standards.

Conference Between Physician and Lawyer

6. Prior to the submission of a medical report by the attending physician to the patient's lawyer, conferences may be required between the patient's physician and lawyer. Conferences at the request of either the physician or the lawyer should be arranged at the mutual convenience of each. At the conference there should be candid discussion of the medical aspects of the litigation to promote complete understanding between the patient's physician and lawyer.

ARTICLE II

EXAMINING PHYSICIAN'S MEDICAL REPORTS

The "examining physician," as the term is used in the Code, differs from the "attending physician" and the "expert" in that he does not prescribe treatment and is not necessarily expected to testify at the trial. His examination is made at the request of the lawyer for one or both of the parties or at the request of the court. Should he later testify at the trial he testifies as an expert.

Request for Examination and Report

1. Where the examination is made at the behest of either party, a written request for examination should be sent to the physician by the lawyer asking for the examination stating the nature of the examination desired.

The request should be specific and request the physician to give the following information:

- (a) Pertinent subjective complaints elicited from the patient.
- (b) Pertinent objective findings made by the physician.
- (c) The physician's diagnosis as of the time of the examination.
- (d) Interpretation of x-rays, electroencephalograms, electhomyograms and any and all other pertinent data used in the diagnosis (source of interpretation should be stated).
- (e) The physician's opinion as to whether there is a permanent residual from the injury, and the extent thereof.
- (f) The prognosis.
- (g) The physician's opinion as to the necessity of further medical or surgical treatment.

Report of Examination

2. The examining physician should send the report of the examination to the lawyer requesting the examination as soon as practicable after the examination. The report should be clear and concise and should contain specific responses to the elements enumerated in the lawyer's request.

Report is Confidential

3. The examining physician shall not give medical information to the opposing lawyer without the authorization of the lawyer who requested the examination, unless the examination is pursuant to order of court.

Keep Complete Records

4. The examining physician should prepare, keep and preserve full and complete records of his examination and diagnostic findings (laboratory).

Report Should Be Complete

5. The report to the lawyer should be objective, impartial, and complete. The examining physician should not give, and should not be asked to give a report that does not comply with these standards.

Examination at the Request of the Court

6. Provisions for examination at the request of the court, and the procedure to be followed, are covered by rule of court or by statute.

Copy of Report to Employee in **Workmen's Compensation Cases**

7. In Workmen's Compensation cases, the examining physician selected by the employer is required to deliver a copy of his report to the injured employee or his lawyer, unless the employee has a physician of his own selection present during the examination.

ARTICLE III MEDICAL FEES

Attending Physician

- (1) The attending physician of a patient whose physical or mental condition is the subject matter in litigation may, in the manner provided by the Statutes of the State of Illinois, perfect his lien for medical fees for his services rendered to the patient. (See Appendix for suggested form of lien notice.)
- (2) The physician should also notify the lawyer for the patient of his lien by sending him a copy of the Notice of Lien.
- (3) The lawyer for the patient should explain to his client the nature of the lien and necessity for satisfying it out of any recovery. The lawyer should take all reasonable steps to assure payment for the physician's services out of any recovery made for the client. If the lawyer finds that he cannot accomplish this, he should notify the physician immediately so that he may take steps to enforce his lien. (See Appendix for suggested form of authorization to be used by lawyer.)
- (4) In the event that the attending physician expends time in preparing a report, in appearing at a deposition or in court, or in any other manner for his patient, the physician shall be entitled to a reasonable fee from his patient. The lawyer shall take all reasonable steps to see that his client pays the said fee.
- (5) The attending physician shall not charge his patient a higher fee because the patient may recover the amount of these charges as the result of a claim or litigation.
- (6) The lawyer should not pay the attending physician's fee except with the client's funds.
- (7) The physician's fee shall not be contingent upon the outcome of the litigation.

Examining Physician

(1) A physician who makes an examination at for October, 1967

the request of a lawyer shall charge the reasonable value of his services so rendered on the same basis as if his services were not rendered to patient in connection with litigation. The physician's charge for reports, conferences with the lawyer, and appearances at depositions and in court shall also be based upon the reasonable value of those services.

(2) The said charges shall be the obligation of the client and not of his lawyer. The lawyer shall make every reasonable effort to see to it that his client pays the fee of the examining physician for all services rendered by the physician to or in behalf of said patient.

(3) The examining physician's fee shall not be contingent upon the outcome of the litigation. Experts

- (1) The physician whose services may be rendered as an expert in connection with any phase of litigation, shall not charge more than the reasonable value of his services. The fee shall be the obligation of the patient-client and not of his lawyer.
- (2) The lawyer shall make every reasonable effort to see that his client pays the fee of the expert.
- (3) The expert's fee shall not be contingent upon the outcome of the litigation.

ARTICLE IV THE PHYSICIAN AT THE TRIAL OR HEARING ON DEPOSITION

Conferences Prior to Trial

- (1) The lawyer and the physician should arrange to confer with each other before the physician testifies at any hearing, and if possible, before the trial commences. At the conference the common problems involved in the case should be discussed. The lawyer has the responsibility of acquainting the physician with any particular legal problems which might involve the physician, and with the assistance of the physician should determine the areas in which the physician will be called to testify. The lawyer should familiarize the physician with the contents of any proposed hypothetical questions.
- (2) The physician should make every effort to cooperate with the lawyer in regard to this conference. Each should be mindful of the demands on the other's time in making appointments for conferences, in the time spent on conferences, and in notifying the other promptly if, for any reason, either is unable to attend the appointed conference. While the physician should recognize that he is not an advocate and the lawyer is, he should at the conference familiarize the lawyer with the medical problems involved, the areas in which he (the physician) feels qualified to testify, and the facts and opinions about which he is prepared to testify.

Court Arrangements

(1) The lawyer should make every effort to be economical in his use of the physician's time. He should give the physician reasonable advance notice of when and how long he shall be needed in court, advise the physician promptly of any changes in the time of his needed appearance and should call the physician as a witness upon his arrival at court, with as little delay as possible.

(2) The physician has an obligation to be in court at the time requested. He should recognize that only a true emergency will excuse his nonattendance. In the event that such an emergency does arise, he should, as soon as possible, notify the lawyer who requested his appearance in court of his inability to be in court at the appointed time and also advise as to the earliest time he will be available to testify.

Subpoenas

(1) The lawyer should determine whether or not the physician should be served with a subpoena. If the physician is to be served with a subpoena, the lawyer should advise the physician of the reason for serving him; for example, that service of a subpoena is necessary to lay the foundation for a continuance if the physician is unable to attend the trial due to an emergency or other cause. If service of a subpoena is to be had, the lawyer should advise the physician in advance, and if possible, arrange for the service of the subpoena at a time and place satisfactory to the physician.

(2) The physician should recognize that a lawyer may deem it necessary to subpoena the physician, and that the physician is obliged to answer the subpoena as any other citizen. He should cooperate with the lawyer with regard to the time and place of service.

Conduct as a Witness

(1) It is improper for a lawyer to attempt to color or otherwise influence the professional opinion of a physician.

(2) The physician's testimony should be unbiased and given in terms understandable to the jury. He should be prepared to testify in detail as to his qualifications, the medical facts in the case, and to give his frank and honest medical opinion in regard thereto. Technical or medical terms, if used, should be carefully and fully explained. The physician should remember that he is not an advocate trying a lawsuit, nor should he feel that he is taking sides on any particular medical issue or fact.

Conclusion

If the above interprofessional code for physicians and attorneys of Illinois was followed by all parties, the following results might well be

- 1. A greatly improved understanding of each others problems by the members of both profes-
- 2. A considerable savings of time by all partici-
 - 3. Better public relations for both groups.
 - 4. Better and easier collections of fees.
- 5. Better and more efficient administration of justice.

A suggested form of physician's lien notice is as follows:

NOTICE OF LIEN In favor of John M. Jones, M.D. 1424 Chestnut Street Springfield, Illinois

Dated this _____ day

of, 19......

TO:	••••
I am adviced that	
I am advised thatwhose address is,	
has a claim, right, or cause of action against yo	
for injuries received, resulting from an accident	
or about	
You are notified that I claim a lien upon such	ch
claim, right, or cause of action for reasonab	le
charges for medical services rendered sa	
on accou	nt
of said injuries, the total amount of such lien n to exceed one-third (1/3) of any sums due or pa	
to such injured person by compromise, settlement	
or satisfaction after the satisfaction of any atto)r-
ney's lien, if any.	
This lien is claimed pursuant to an Act provi	d-
ing for a lien for physicians rendering treatme	nt
to injured persons approved July 23, 1959 (Cha	p.
82, Sec. 101.1 through 101.6, Ill. Rev. Stat	s.,
1965).	•
Money paid in settlement of this claim or settlement or payment of any judgment or decr	
on this claim is subject to this lien, and befo	re
making settlement, you should consult with n	
and see that this lien is satisfied.	
Signature	
(This notice to be served on both the injur-	ed
person and the parties against whom such claim	or
right of action exists, by certified mail or in peson.)	:1-
Suggested form of authorization to be used	hν
lawyer:	-)
(Place) (Date)	
"I,, here	by
authorize and direct	,
my attorney, or attorneys to pay from the procee	ds
of any recovery in my case to Dr.	
for professional services in the treatment of i	
juries sustained by me and/or my wife an	
/or child or children, as the case may be, in	an
accident which occurred on, 19	,
said payment to include professional services her	e-
tofore rendered and those rendered to the time	
the settlement or other disposition of my case f	
the treatment of said injuries, and fees for testif	y-
ing in court." "I further authorize said Doctor to furnish sa	id
	.14
Attorney with any reports he may request in re	ef-
Attorney with any reports he may request in re- erence to my injury. I understand that this in way relieves me of my personal responsibility	ef- no
Attorney with any reports he may request in re- erence to my injury. I understand that this in a way relieves me of my personal responsibility pay all such medical charges."	ef- no to
Attorney with any reports he may request in received to my injury. I understand that this in a way relieves me of my personal responsibility pay all such medical charges." Witness	ef- no to
Attorney with any reports he may request in received to my injury. I understand that this in a way relieves me of my personal responsibility pay all such medical charges." Witness Signed	ef- no to
Attorney with any reports he may request in received to my injury. I understand that this in a way relieves me of my personal responsibility pay all such medical charges." Witness	to



ALIVE OR DEAD?

Several months ago while in the South, I walked through an excellent intensive care unit housing seven critically ill patients. Two oldsters were moribund, yet breathing with the aid of a respirator, "circulating" via a pacemaker, and nourished by means of intraveneous fluids. Were these persons dead or alive? We later visited another part of the hospital where an electroencephalographic department was being installed. The physician in charge told us that the machines would also monitor the brain waves of patients in the intensive care unit. "When the waves flatten out, we will know they are dead."

Medicolegal suits have been instituted by persons claiming that their dearly departed relative may have been alive when pronounced dead. The pulse and respirations may not have been detectable and the corneal reflexes absent. But what about the brain?

The American Electroencephalograph Society also is cognizant of this problem. Recently they compounded the difficulty by creating five basic criteria for determining brain death. These guidelines are designed to protect the physician and the electronecephalographer.

"No hypothermia or anesthetic drug levels.

No reflexes, spontaneous breathing, or muscle activity.

A flat electroencephalogram at grains of 50 microvolts per 5 mm. through 15 mm. over a 20-minute period of continuous recording.

No clinical or EEG response to noise for October, 1967

or pinch."

The last of these and possibly the one that will cause comment is "A repeat of all these conditions 24 to 72 hours later."

The pathologist authorized to do an autopsy and the undertakers are not going to like this recommendation.

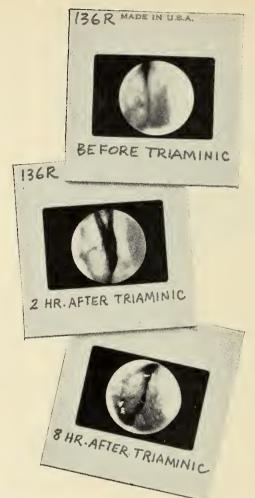
We assume that safeguards such as these are needed when the individual is in an intensive care unit and death is prolonged with respirators and pacemakers. The plan is not feasible nor practicable when death occurs in smaller communities. In my opinion, this is an example of medical progress backfiring, with some obvious exceptions. Attaching a respirator, pacemaker, and bottles of blood, glucose, and saline to the dying person is easy. But once done, the physician may be in serious trouble when the decision comes to turn off the respirator.

The American Electroencephalography Society suggests as additional safeguards to the five criteria mentioned that the physician share this responsibility with one or more colleagues, that he inform the family, hospital director, and special and floor nurses. The medical examiner or coroner should be contacted if the case is medicolegal.

There is merit in letting the oldster or person with a chronic or fatal disease die with dignity. Never start any process that might be difficult to stop.

T. R. VAN DELLEN, M.D. Editor

Medical Tribune. Criteria for Death of Brain Aimed to Reduce Lawsuits. 1967.



timed to work while your patient does

A study being conducted by the Department of Otolaryngology, Greater Baltimore Medical Center is stockpiling evidence that points to the fast action and prolonged relief effected by Triaminic in the treatment of nasal congestion.

Begun in March 1966, the study to date has encompassed 85 patients with common nasal disorders—

and measured their response to recommended doses of Triaminic tablets.

Timed to release its oral nasal decongestant and two antihistamines within 8 hours, Triaminic was found to effect partial or complete relief in better than 82% of the subjects treated. Clearing nasal obstruction. Reducing turbinate swelling. Making breathing easier.

It's a comforting thing to know that Triaminic really works.

Triaminic ® timed

timed-release tablets

Each timed-release tablet contains:

Phenylpropanolamine hydrochloride 50mg. Pyrilamine maleate 25mg. Pheniramine maleate 25mg. Side effects: Occasional drowsiness, blurred vision, cardiac palpitations, flushing, dizziness, nervousness or gastrointestinal upsets. Precautions: The patient should be advised not to drive a car or operate dangerous machinery if drowsiness occurs. Use with caution in patients with hypertension, heart disease, diabetes or thyrotoxicosis.

DORSEY LABORATORIES • a division of The Wander Company • LINCOLN, NEBRASKA 68501

NEW PHARMACEUTICAL **SPECIALTIES**

by Paul deHaen

For detailed information regarding indications, dosage, contraindicatons and adverse reactions, refer to the manufacturer's package insert or brochure.

Single Chemicals-Drugs not previously known,

including new salts.

Duplicate Single Products—Drugs marketed by more than one manufacturer.

Combination Products-Drugs consisting of two or more active ingredients.

New Dosage Forms-Of a previously introduced product.

DUPLICATE SINGLE PRODUCTS

PROSERUM 25 Hospital Solutions B. Manufacturer: Pitman-Moore
Nonproprietary Name: Normal Serum Albumin (Human), Salt-poor, USP
Indications: Replacement therapy in hypoprotein-

emic states, hypovolemic shock, and to promote diuresis in cases of edema due to chronic renal disease and hepatic cirrhosis.

Contraindications: None mentioned.

Dosage: I.V., diluted or undiluted, amount de-

pending on diagnosis.

Supplied: Vials-25% sol.; 20 and 50 cc.

ANESTACON Anesthetic-Local and Topical B Manufacturer: Conal Pharmaceuticals Nonproprietary Name: Lidocaine HC1

Indications: For rapid anesthesia of urethral mucosa prior to urethroetscopy, cystoscopy, urethral dilation and catherization.

Contraindications: History of allergy to lido-

caine HC1

Dosage: Males-5 to 15 cc. instilled into urethra. Females-1 cc. instilled into urethra.

Supplied: Sterile solution-2%; 240 cc. containers

and 15 cc. disposable units.

COMBINATION PRODUCTS

RACET LCD CREAM Dermatologic Prep. Other

Manufacturer: Lemmon Pharmacal Co. Composition: Iodochlorhydroxyquin 3%

Hydrocortisone 0.5%

Coal Tar Solution 5%
Indications: Eczematous conditions, and for control of inflammation and pruritus.
Contraindications: Not for use in the eye or in the presence of tuberculosis, vaccinia, varical skip conditions. Avaid cella or other viral skin conditions. Avoid exposure of treated areas to sunlight.

Dosage: Apply 3 or 4 times daily.

Supplied: Tubes-30 Gm.; boxes of 12.

Jars-454 Gm.

RAUZIDE Hypotensive Manufacturer: E. R. Squibb & Sons Composition: Each tablet contains:

Rauwolfia serpentina 50 mg.

Bendroflumethiazide 4 mg.
Indications: Essential hypertension, in those patients not benefited by rauwolfia alone; patients who show signs of congestive failure and edema; in cases where an immediate lowering of blood pressure is essential.

(Continued on page 583)



He leaves to make an urgent call But doesn't use the phone at all

Parepectolin for quick relief of acute diarrhea

- ... soothes colicky pain with paregoric
- ... consolidates fluid stools with pectin
- ... adsorbs irritants with kaolin, and protects intestinal mucosa

Whether it's a 24-hour "bug", a food problem. or simply nervousness and anxiety, Parepectolin will bring the diarrhea under control until etiology can be determined. In some cases, Parepectolin may be all the therapy necessary.

repecto

Each fluid ounce of creamy white suspension contains: Paregoric (equivalent)......(1.0 dram) 3.7 ml. Contains opium (4 grain) 15 mg. per fluid

warning: may be habit forming

Pectin (2½ grains) 162 mg. Kaolin (specially purified)....(85 grains) 5.5 Gm. (alcohol 0.69%)

Usual Adult Dose: One or two tablespoonfuls three times daily.



 \mathbf{R}

WILLIAM H. RORER, INC. Fort Washington, Pa.

Night Leg Cramps ... Unwelcome Bedfellow In Diabetes, Arthritis, and Peripheral Vascular Disorders²



now... specific therapy for night leg cramps

Walker

GUINAMM

Consistently effective, QUINAMM provided complete relief in 94% of 200 patients studied, many of whom were severe cases refractory to other medication.³ Your prescription for one tablet at bedtime often controls painful night cramps with the initial dose . . . helps restore restful sleep.



THE NATIONAL DRUG COMPANY DIVISION OF RICHARDSON MERRELL INC PHILADELPHIA, PENNSYLVANIA 19144 Prescribing Information: Composition: Each white, beveled, compressed tablet contains: Quinine Sulfate 260 mg. and Aminophylline 195 mg. Contraindication: QUINAMM is contraindicated in pregnancy because of its quinine content. Precautions: Aminophylline may produce intestinal cramps in some instances, and quinine may produce symptoms of cinchonism, such as tinnitus, dizziness, and gastrointestinal disturbance. Discontinue use if ringing in the eors, deafness, skin rash, or visual disturbances occur. Dosage: One tablet upon retiring. Where necessary, dosage may be increased to one tablet following the evening meal and one tablet upon retiring. Supplied: Bottles of 100 and 500 tablets. References: 1. Shuman, C.: Am. J. Med. Sci., 225:54, 1953. 2. Perchuk, E., et al.: Angiology, 12:102, 1961. 3. Rawls, W., et al.: Med. Times, 87:818, 1959.

New Pharmaceutical Supplies

(Continued from page 581)

Contraindications: Hypersensitivity to any of its components; severe renal or hepatic disease. Dosage: Initial—1 to 4 tablets daily at bedtime.

Maintenance-1 or 2 tablets daily at mealtime,
may range up to 4 tablets.

Supplied: Tablets-bottles of 100.

COMBINATION PRODUCTS

C-RON FA Hematinics/Vitamins Comb.
Manufacturer: Rowell Laboratories Composition: Ferrous fumarate 200 mg. Ascorbic Acid 600 mg. Folic Acid 0.5 mg.

Indications: Iron-deficiency and megaloblastic

anemias of pregnancy.

Contraindications: None mentioned.

Dosage: 1 to 3 tablets daily. Supplied: Tablets-bottles and 100 and 1000.

NEW DOSAGE FORMS

MEDROL ENPAK Hormones-Corticoids \mathbf{R} Manufacturer: The Upjohn Company Nonproprietary Name: Methylprednisolone acetate

Indications: Rectal instillation for local effect as

adjunctive therapy of ulcerative colitis.
ontraindications: Herpes simplex ke Contraindications: keratitis; acute psychoses; latent, questionably healed or active tuberculosis; peptic ulcer; Cushing's syndrome; diverticulitis; fresh intestinal anasosteoporosis; renal insufficiency; thromboembolic tendencies; chronic psychotic reactions; diabetes mellitus; hypertension; local or systemic infections including vaccinia and varicella as well as fungal and other exanthematous disease; pregnancy.

Dosage: 40 mg. administered as retention enema or by continuous drip 3 to 7 times weekly for

periods of 2 or more weeks. Supplied: Liquid-40 mg.; boxes of 6 or 12 bottles.

 \mathbf{R}

SULADRIN Eye Preparation Manufacturer: Alcon Laboratories Composition: Sulfisoxazole 4% (as the diolamine salt)

Phenylephrine HC1 0.12% Indications: Acute and chronic conjunctival infections susceptible to sulfonamide therapy, and for prophylaxis to help provide a sterile field.

Contraindications: Known sulfonamide sensitiv-

Dosage: Two drops in eye every 2 to 4 hours. Supplied: Ophthalmic solution-5 cc. and 15cc.; glass dropper bottle.

ULGESTIN Antihistamine \mathbf{R} Manufacturer: Ulmer Pharmacal Co. Composition: Atropine sulfate 0.2 mg.

Phenylpropanolamine HC1 12.5 mg. Chlorpheniramine maleate 5.0 mg. Indications: Temporary relief of allergic symptoms caused by upper respiratory infections including sinusitis and hay fever

Contraindications: Use with extreme caution in patients with: hypertension, hyperthyroidism, organic heart disease, severe diabetes mellitus, glaucoma, asthma, prostatic hypertrophy, known sensitivity to any of the ingredients.

Dosage: 0.5 to 1 cc. i.m. or s.c., followed by oral

medication three or more hours later.

Supplied: Multiple dose vials-10 cc.

uidhan

- **EMPHYSEMA**
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS



Each tablet contains.

Lach vacter contains.	
Potassium Iodide195	i mg.
Aminophylline	
Phenobarbital, Caution: May be habit forming 2	
Ephedrine HCl	i mg.

FEDERAL LAW PROHIBITS DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG-Formula, dosage and package identical to Mudrane—except—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR-Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC. RICHMOND, V1RG1N1A 23217

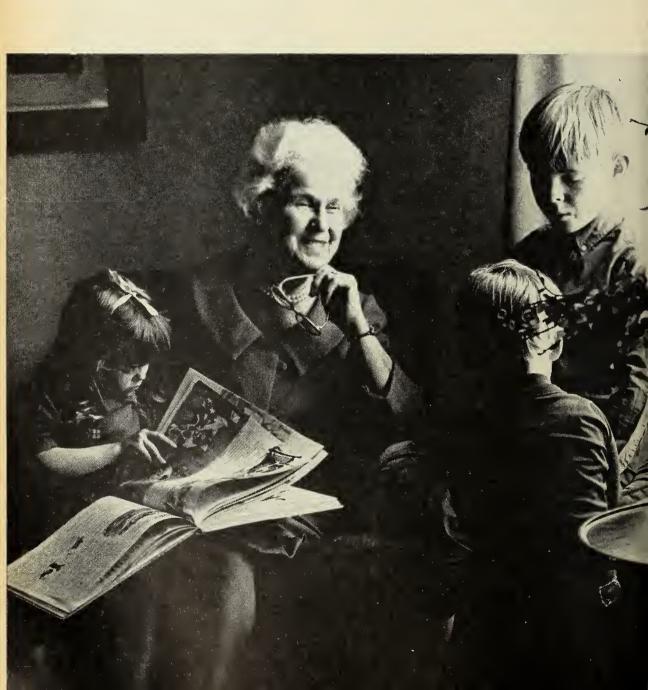
Manufacturers of ethical pharmaceuticals since 1856



The Mediatric®Age:

Many patients, with or without a functional illness, show symptom an aging metabolism: disinterest...lassitude...vague aches and pai

Mediatric® can help them lead a more active, useful l



ndications: Hypertension and many types of dema involving retention of salt and water.

ontraindications: Hypersensitivity and most ases of severe renal or hepatic disease.

Varning: With the administration of entericoated potassium supplements, which should e used only when adequate dietary supplementation is not practical, the possibility of mall bowel lesions (obstruction, hemorage, and perforation) should be kept in nind. Surgery for these lesions has freuently been required and deaths have ocurred. Discontinue enteric-coated potasium supplements immediately if abdominal ain, distention, nausea, vomiting, or gastrotestinal bleeding occur.

se with caution in pregnant patients, since ne drug may cross the placental barrier and dverse reactions which may occur in the dult (thrombocytopenia, hyperbilirubinemia, Itered carbohydrate metabolism, etc.) are otential problems in the newborn.

recautions: Antihypertensive therapy with ygroton should always be initiated cauously in postsympathectomy patients and
patients receiving ganglionic blocking
gents or other potent antihypertensive drugs,
r curare. Reduce dosage of concomitant
ntihypertensive agents by at least one-half,
arbiturates, narcotics or alcohol may poentiate hypotension. Because of the possiility of progression of renal damage, peridic determination of the BUN is indicated,
iscontinue if the BUN rises or liver dysfuncon is aggravated. Hepatic coma may be
recipitated.

lectrolyte imbalance, sodium and/or potasium depletion may occur. If potassium depleon should occur during therapy, Hygroton hould be discontinued and potassium suplements given, provided the patient does ot have marked oliguria.

ake special care in cirrhosis or severe schemic heart disease and in patients reeiving corticosteroids, ACTH, or digitalis. lalt restriction is not recommended.

dverse Reactions: Nausea, gastric irritation, omiting, anorexia, constipation and crampng, dizziness, weakness, restlessness, hyerglycemia, hyperuricemia, headache, musle cramps, orthostatic hypotension, aplastic
nemia, leukopenia, thrombocytopenia,
granulocytosis, impotence, dysuria, transient
nyopia, skin rashes, urticaria, purpura, nectizing angiitis, acute gout, and pancreatitis
hen epigastric pain or unexplained G.I.
ymptoms develop after prolonged adminisation. Other reactions reported with this
lass of compounds include: jaundice, xanlopsia, paresthesia, and photosensitization.

verage Dosage: One tablet with breakfast aily or every other day.

vailability: White, single-scored tablets of 0 mg. and aqua tablets of 50 mg., in botes of 100 and 1000. (B)46-230-D

or full details, please see the complete escribing information.

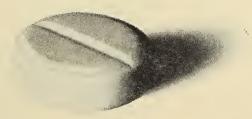
yigy Pharmaceuticals vision of ∍igy Chemical Corporation dsley, New York

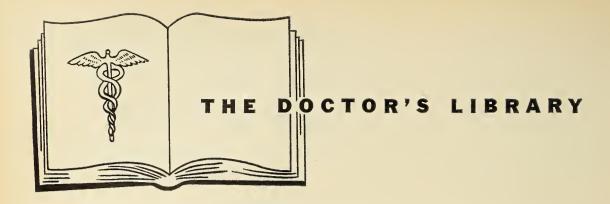
Here's the Hygroton they don't have to halve



New Hygroton 50 mg. from Geigy

to go with the Hygroton 100 mg. you know





COMPLICATIONS IN SURGERY AND THEIR MANAGEMENT. Edited by Curtis P. Artz, M.D., and James D. Hardy, M.D. Second edition, with contributions by 52 authorities. W. B. Saunders Co., Philadelphia, 1967. 888 pages, illustrated. \$24.

This book, in its new edition, will help to provide an up-to-date understanding of the diagnosis and management of surgical complications on the part of the general surgeon. All sections of this book have been revised by contributors who are among the leading physicians in this country. It is of great aid in its revisions on such topics as Shock as Complications in the Surgical Patient and Complications of Parenteral Fluid Therapy. The authors begin with discussions of basic physiologic aspects and then go on to delineate specific problems. A wealth of material is included on problems in cardiopulmonary and gastrointestinal surgery. Gynecologic, urologic and pediatric problems are also included. In some of the chapters brief surgical considerations are discussed. Special chapters describe a variety of complications occurring during and subsequent to different types of anesthetic procedures and their management. Local and systemic problems following radiation therapy are also described. An entirely new chapter has been added on Common Errors in the Management of Hand Injuries.

The material is presented in a concise manner clearly written, and illustrations are informative and clear. It is not the intention of this book to describe individual surgical techniques, but to be used as a reference volume for the physician faced with a surgical complication. It is suggested that additional reading be done to cover special problems.

Gabriel A. Lorenzo, M.D.

THE PEDIATRICIAN'S OPHTHALMOLOGY, edited by S. D. Liebman, M.D. and S. G. Gellis, M.D. St. Louis, The C. V. Mosby Company, 1966. Clothbound, 352 pages, 108 figures in black and white, 8 tables, 7 color plates, chapter references, index. Price: \$19.50.

This book is co-edited by a pediatrician and an ophthalmologist. Several noted authors have contributed to the 17 chapters.

The first two chapters cover anatomy and growth and development of the eye. Here the reader learns why certain visual problems must be recognized and treated in very early childhood and what to expect from a child's eyes as he grows older.

The chapter on examination gears its methods to the specific presenting complaint, i.e. visual loss, pain, deformity, etc., so that the doctor is able to quickly orient himself to the problem.

The confusing subject of strabismus is offered in a crisp and concise manner by one of the nation's foremost strabismologists and is probably the best account of its kind to be found in the literature. It is an absolute must for general practitioners and pediatricians alike.

Throughout the opening chapters one gains a familiarity with the oft used but little understood ophthalmologist's glossary.

The mid portion of the book deals with external and internal diseases, ocular manifestations of systemic diseases, glaucoma, cataracts, neoplasms, neuro-ophthalmology, diseases of the orbit, and trauma. These are very well done with excellent illustrations and photographs. The material is current and authoritative. Shortcomings are a section on retinal detachment which is too long and detailed for a work of this type and a section on trauma which is not long enough.

(Continued on page 596)



pensing without prescription. for October, 1967

Caution: Federal law prohibits dis-

595

Clinics for Crippled Children

Twenty-five clinics for Illinois' physically handicapped children have been scheduled for November by the University of Illinois, Division of Services for Crippled Children. The Division will conduct 19 general clinics providing diagnostic orthopedic, pediatric, speech and hearing examination along with medical social, and nursing service. There will be four special clinics for children with cardiac conditions and rheumatic fever, and two for children with cerebral palsy. Clinicians are selected from among private physicians who are certified Board members. Any private physician may refer to or bring to a convenient clinic any child or children for whom he may want examination or consultant services.

Nov. 1, Hinsdale—Hinsdale Sanitarium Nov. 2, Peoria Cerebral Palsy (A.M.)—

Roosevelt School

Nov. 2, DuQuoin — Marshall-Browning Hospital

Oov. 2, Sterling—Community General Hospital

Nov. 7, Fairfield—Fairfield Memorial Hospital

Nov. 8, Champaign-Urbana — McKinley Hospital

Nov. 8, Joliet-St. Joseph's Hospital

Nov. 9 Macomb-McDonough District Hospital

Nov. 9, Springfield General-St. John's Hospital

Nov. 10, Chicago Heights Cardiac — St. James Hospital

Nov. 14, East St. Louis — Christian Welfare Hospital

Nov. 14, Peoria General – Children's Hospital

Nov. 15, Centralia — St. Mary's Hospital Nov. 15, Evergreen Park — Little Company of Mary Hospital

Nov. 15, Rockford — St. Anthony's Hospital Nov. 16, Decatur—Decatur & Macon County Hospital

Nov. 16, Effingham Rheumatic Fever & Cardiac — St. Anthony Memorial Hospital

November 16, Elmhurst Cardiac—Memorial Hospital at DuPage County

Nov. 17, Chicago Heights Cardiac — St. James Hospital

Nov. 21, Alton General — Alton Memorial Hospital

Nov. 22, Elgin-Sherman Hospital

Nov. 28, East St. Louis — Christian Welfare Hospital

Nov. 28, Peoria General — Children's Hospital

Nov. 28, Danville - Lake View Hospital

Nov. 29, Springfield Cerebral Palsy (P.M.) —Diocesan Center, St. Paul's Cathedral, 815 S. 2nd

The Division of Services for Crippled Children is the official state agency established to provide medical, surgical, corrective, and other services and facilities for diagnosis, hospitalization and after-care for children with crippling conditions or who are suffering from condition that may lead to crippling.

In carrying on its program, the division works cooperatively with local medical societies, hosiptals, the Illinois Children's Hospital-School, civic and fraternal clubs, visiting nurse association, local social and welfare agencies, local chapters of the National foundation and other interested groups. In all cases, the work of the Division is intended to extend and supplement, not supplant activities of other agencies, either public or private, state or local, carried on in behalf of crippled chidren.

The Doctor's Library

(Continued from page 594)

Closing chapters consider reading problems, social and emotional problems, and genetic problems. The last of these includes an outstanding compilation of inherited conditions that manifest ocular pathology.

In preparing this book the authors have presented information that will help to answer many questions regarding children's eyes. As the title indicates, the book has been written primarily for pediatricians but it might take its place beside other specialty books in any physician's library. Certainly the reader will benefit by becoming more familiar and confident in coping with ocular problems in the young patient.

Carl L. Fetkenhour, M.D.

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OPINIONS AND REPORTS ON ETHICAL RELATIONS

A physician should not dispose of his services under terms or conditions which tend to interfere with or impair the free and complete exercise of his medical judgment and skill or tend to cause a deterioration of the quality of medical care.

1. CONDITIONS OF MEDICAL PRAC-

A physician should not dispose of his services under conditions that make it impossible to render adequate service to his patients, except under circumstances in which the patients concerned might be deprived of immediately necessary care. (Principles of Medical Ethics, 1955 edition, Chapter VII, Section 2.)

2. CONTRACT PRACTICE

Contract practice as applied to medicine means the practice of medicine under an agreement between a physician or a group of physicians, as principals or agents, and a corporation, organization, political subdivision or individual, whereby partial or full

health or other conditions offecting my insurability are as described in the application.

Licensed Agent

Form No. L-168-67A

medical services are provided for a group or class of individuals on the basis of a fee schedule, or for a salary or for a fixed rate per capita.

Contract practice per se is not unethical. Contract practice is unethical if it permits of features or conditions that are declared unethical in these Principles of Medical Ethics or if the contract or any of its provisions causes deterioration of the quality of the medical services rendered. (Principles of Medical Ethics, 1955 Edition, Chapter VII, Section 3.)

3. CONTRACT PRACTICE

It will be observed that in the definition of contract practice submitted to the House in 1926 no mention is made of the ethics of the practice for the reason that contract practice per se is not an ethical question, ethics being concerned with the form of the contract and the conditions under which it is made. That there are many (Continued on page 614)

Signature of Applicant

APPLICATION FOR TERM LIFE INSURANCE
to PROFESSIONAL LIFE & CASUALTY COMPANY, CHICAGO, ILLINOIS

1	Full Name of Applicant						
• •	Dote of Birth Ploce of Birth						
2.	Mo. Day Yeor. City State Height 3. Mole, Femole 4. Married, Single, Divorced, Separated						
5. PERMANENT							
	ADDRESS: City State Zip No. of Y						
6.	Medical School: Nome City & State Date Entered Medical School						
7.	AMOUNT OF INSURANCE: 10 YEAR CONVERTIBLE* TERM \$10,000.00						
	PREMIUMS PAYABLE: Annually Semi-Annually Other Premium: \$						
9.	DISPOSITION OF ANNUAL DIVIDENDS: Poy in Cosh Accumulate of Interest Apply to Premium						
10.	Beneficiary						
	Name in Full Do you know of any impoirment now existing in your health or physical condition? Yes If "yes" give porticulors						
12.	Have you consulted a physician for illness during the past three years? Yes						
-							
IH	EREBY APPLY for insurance described above and agree to pay premiums therefor at the rate shown above.						

INFORMATION in this application is given to abtain this insurance and is true and complete to the best of my knowledge and belief. The Compshall incur no obligation because of this application unless and until it is approved by the Company and the first premium is paid in full while

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Your term policy may be converted to our Participating Whole Life Plan at any time during the policy period without any restrictions or limitations.

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21	\$33.00	\$17.00	\$34.00	\$17.50	Ì	
22	33.50	17.50	34.50	18.00	Ī	
23	34.00	17.50	35.00	18.00	Ī	
24	34.50	18.00	35,50	18.50		
25	35,00	18.00	36.00	18.50	ì	
26	35.50	18.50	36.50	19.00		
27	36.00	18.50	37.50	19.50		
28	36.50	19.00	38.50	20.00	ï	
29	37.00	19,50	40.00	21.00	1	
30 mag	37.50	19.50	42.00	22.00	•	

⁻Premiums for \$20,000 Policy are double the above



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North Shore Hospital, a 65-year-old psychiatric facility located on Lake Michigan in Winnetka, Illinois, is an intensive care hospital.

An open staff institution, it provides, through its house and attending staff, a total range of psychotherapies and those related activities which round out a comprehensive treatment program.

A new Half Way Hall, situated in the hospital, has been opened to provide relative freedom of movement in an environment designed to stimulate recovery and provide a necessary phase of interim residence.

A completely open section is a feature of North Shore Hospital's residential plan.

An adolescent program offers boys and girls of high school age a closelystructured program of daily care, with daily classroom attendance and individual tutoring emphasized.

The adjunctive therapies are manned by certified personnel. Occupational and recreational activities not only help structure the patient's day, but offer creative programs in which patients participate according to their emotional health and native capacity.

A therapeutic education program has been introduced for all patients. Medicare patients are offered special attention and remotivation activities.

Psychiatric testing and evaluation is offered, as is individual and group therapy, chemotherapy and the traditional modalities employed in the treatment of emotional illness.

In reputation, performance and location, North Shore Hospital is the psychiatric hospital of choice.



For information, contact: Y
CHARLES H. JONES, M.D.
Superintendent & Psychiatrist in Chief
Telephone: 312—446-8440
225 Sheridan Road, Winnetka, Illinois
(Write for Brochure)

Meeting Memos

Oct. 27-30—The 78th annual meeting of the Association of American Medical Colleges will be held at the New York Hilton where the theme will be "The Continuing Education of the Physician."

Nov. 6-8—The Mayo Clinic and Mayo Foundation will present the first of two identical clinical reviews, a program of lectures and discussions on problems of general interest in medicine and surgery, at the Mayo Civic Auditorium in Rochester, Minn.

Nov. 6-8—University of Chicago's Frontiers in Medicine series continues with a program of "Clinical Allergy and Immunology," the diagnosis and treatment based upon new concepts of the normal and abnormal development of the immune system.

Nov. 8-9—The Cleveland Clinic Educational Foundation will present "Problems in Pelvic Surgery," a postgraduate course in gynecology, at 2020 E. 93rd St., Cleveland.

Nov. 9-11—Illinois League for Nursing will conduct its 8th biennial convention at the Sheraton-Blackstone Hotel, Chicago.

Nov. 10-11—First Biennial Symposium on the Management of Trauma and Disaster Medical Problems, sponsored by the AMA Committee on Disaster Medical Care of the Council on National Security, will be held at the Carillon Hotel, Miami Beach, Fla.

Nov. 12-17—"Exploring Unusual Atmospheres" will be the theme of the American Association for Inhalation Therapy at its 13th Annual Meeting and Lecture Series, the Statler Hilton, Los Angeles, Calif.

Nov. 13-14—The Hahnemann Medical College and Hospital meeting on "A Current View of Congestive Heart Failure" will be held at the Sheraton Hotel, Philadelphia, Pa.

Nov. 13-15—Second presentation by the Mayo Clinic and Mayo Foundation of a program of lectures and discussions on

(Continued on page 613)

New Artificial Kidney

(Continued from page 374)

where, no local discomfort or infection and no cases of blood poisoning—all problems which can occur with use of the external tube and which may require the surgical insertion of a new tube.

He also reported that previous worries by patients about something happening to their "lifelines" are gone and they are able to use their arms freely.

The success of the cleansing process (chronic hemodialysis) in a patient with a non-functioning kidney depends on repeated access to blood vessels that will provide a continuous flow of up to 250 to 300 milliliters (0.033815 of a fluid ounce) of blood per minute.

In order to keep these blood vessels open, there must be continued circulation between artery and vein. This is achieved, in the method used since 1960, by means of the external passage between the two vessels.

The new method produces the same result but requires no tubing which extends outside the body, Dr. Cimino said.

Meeting Memos

(Continued from page 608)

problems of general interest in medicine and surgery; Mayo Civic Auditorium, Rochester, Minn.

Nov. 13-16—The 61st annual meeting, Southern Medical Association, will be held in the Hotel Fountainebleau, Miami Beach, Fla.

Nov. 15-16—"Pain: Neurological and Neurosurgical Aspects" is the theme of the Cleveland Educational Foundation postgraduate continuation course, 2020 E. 93rd St., Cleveland, Ohio.

Nov. 16-19—The annual convention of the National Society for Crippled Children and Adults will be held at the Century Plaza Hotel, Los Angeles, Calif.

Nov. 17-18—"Human Sexual Function and Dysfunction" will be the subject of a postgraduate course of the Hahnemann Medical College and Hospital to be held at the Marriott Motor Hotel, Philadelphia, Pa.



Ethical Relations

(Continued from page 606)

conditions under which contract practice is not only legitimate and ethical, but in fact the only way in which competent medical service can be provided, becomes evident on analysis. It is perfectly evident, therefore, if we are to judge whether a contract is ethical or not, that we must know the form and terms of the contract as well as the particular circumstances under which it is made. As there is such a great variety of contracts, as their form and the circumstances under which they are made differ so widely, it seems impossible, or at least inadvisable, to attempt to define what constitutes an ethical contract. Each case must be judged on its own merits after all the facts pertaining thereto are known.

There are certain points, however, that may be formulated which, when present, definitely determine a contract to be unfair or unethical. These may be stated as follows:

- 1. When the compensation received is inadequate based on the usual fees paid for the same kind of service and class of people in the same community.
- 2. When the compensation is so low as to make it impossible for competent service to be rendered.
- 3. When there is underbidding by physicians in order to secure the contract.
- 4. When a reasonable degree of free choice of physicians is denied those cared for in a community where other competent physicians are readily available.
- 5. When there is solicitation of patients directly or indirectly.

In the interpretation of the rules of ethics as applied to the practice of medicine: (1) By the word "practice" is meant the performance or application of medical knowledge; (2) by "solicitation" is meant to seek professional patronage by oral, written or printed communications either directly or by an agent; (3) by "patient" is meant any person ill or otherwise. (House of Delegates, 1927)

4. PURVEYAL OF MEDICAL SERVICE

A physician should not dispose of his professional attainments or services to any hospital, lay body, organization, group or individual by whatever name called, or however organized, under terms or conditions which permit exploitation of the services of the physician for the financial profit of the agency concerned. Such a procedure is beneath the dignity of professional practice and is harmful alike to the profession of medicine and the welfare of the people. (Principles of Medicine Ethics, 1955 edition, Chapter VII, Section 5.)

5. PURVEYAL OF MEDICAL SERVICE TO DIRECT PROFIT OF LAY GROUP

The privilege of healing the sick as a profession is a right granted only to those properly qualified and licensed by the state. It is a privilege belonging only to the medical profession. It is a sacrifice of professional dignity that this exclusive right of medicine is so often sold for individual gain or its possessor deprived of it against his will. In increasing numbers, physicians are disposing of their professional attainments to lay organizations under terms which permit a direct profit from the fees or salaries paid for their services to accrue to the lay bodies employing them. Such a procedure is absolutely destructive of that personal responsibility and relationship which is essential to the best interests of the patient. Outstanding examples of this type of unearned gain are not difficult to find. There are insurance companies administering workmen's compensation benefits wherein the salaries or fees paid to the physician by the insurance company are so much below the legal fees on which the premium paid by the industry is based as to furnish a large direct profit to the insurance company. Certain hospitals are forbidding their staffs of physicians to charge fees for their professional services to "house cases" but are themselves collecting such fees and absorbing them in hospital income. Such universities, by employing full time hospital staffs and opening their doors to

(Continued on page 616)

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vember 27
SPECIALTY REVIEW COURSE IN UROLOGY, November 13
SPECIALTY REVIEW COURSE IN RADIOLOGY, November 13
SPECIALTY REVIEW COURSE IN ORTHOPEDICS, December 11
SPECIALTY REVIEW COURSE IN PEDIATRICS, December 4
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MANAGEMENT OF COMMON FRACTURES, One Week, No-

vember 13
PROCTOSCOPY & Varicose Veins, One Week, December 11
SURGICAL & RADIATION Rx OF GYN. MALIGNANCIES, One
Week, Oct. 30
VAGINAL APPROACH TO PELVIC SURGERY, One Week, December 11

cember 11
GYNECOLOGY, Office & Operative, One Week, November 13
OBSTETRICS, General & Surgical, One Week, November 6
BASIC INTERNAL MEDICINE, One Week, November 13
ADVANCES IN MEDICINE, One Week, October 23
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OBITUARIES

*Dr. M. Mitchell Crayne, Lincolnwood, died Aug. 12 at the age of 50. He was a practicing physician in Chicago for 25 years. *Dr. William Clark Doak, Jerseyville, died Aug. 31 at the age of 51. He served as a captain in the medical corps of the U.S. Army during World War II.

*Dr. Benjamin L. Ebert, Chicago, died Aug. 25 at the age of 63. He was an associate member of the American Hospital and a fellow of the International College of Surgeons.

*Dr. Herbert F. Fenwick, Orland Park, died Sept. 12 at the age of 72. He was a flight surgeon and designated examiner of airline pilots for the Federal Aviation Administration for 35 years and past president of the Aerospace Medical Association. *Dr. Lester E. Frankenthal Jr., past president of the medical staff of Michael Reese Hospital, died Sept. 6 at the age of 66. He was a fellow of the American College of Surgeons and the American Board of Obstetricians and Gynecologists, a trustee of Seabury Western Theological Seminary and a past member on the boards of the Jewish Federation of Chicago and the Planned Parenthood Association of Chicago.

*Dr. James E. Segraves, River Forest, died Aug. 22 at the age of 56. He was former medical director and a member of the executive board at St. Anne's Hospital, Chicago.

*Dr. Richard E. Westland, Chicago, died Sept. 8 at the age of 61. He was a staff physician at Swedish Covenant Hospital for the last 30 years.

Ethical Relations (From page 614)

the general public, charging such fees for the professional care of the patients as to net the university no small profit, are in direct and unehtical competition with the profession at large and their own graduates. They are making a direct profit by a practice of questionable legality, from the professional care. (House of Delegates, 1932)

ETHICAL RELATIONS COMMITTEE Willard C. Scrivner, M.D., Chairman J. Ernest Breed, M.D. George E. Giffin, M.D.

William M. Lees, M.D.

PUBLISHED MONTHLY BY: BLUE SHIELD PLAN OF ILLINOIS MEDICAL SERVICE • 425 NORTH MICHIGAN AVENUE • CHICAGO, ILLINOIS 606

Vol. I, No. 2 November, 1967

State Society & Blue Shield Sponsor TV Series

The Illinois State Medical Society and the Blue Shield Plan of Illinois Medical Service will sponsor a thirteen week TV series on pre-retirement training.

This new public service will be produced by WTTW, Channel 11, Chicago's educational station and will be telecast in Chicago and vicinity over both channels 11 and 20. The series will also be shown by other educational channels throughout the state.

Tentative program topics include how to plan a retirement budget, how to avoid emotional problems of aging, how to protect against health care bills, and many others.

When completed, the series will be made available to employers interested in training their employees in how to prepare for retirement and how to make the best out of retirement years.

Many employers have expressed enthusiasm over the potential of the series since learning of the joint undertaking by the State Society and Blue Shield.

Community organizations, Golden Age Clubs, adult education groups are among others who have expressed interest.

We will keep you informed of the progress made and the dates the programs will be telecast after the first of the year.

Reporting Services of Out-of-State Members

At the present time a total of 77 Blue Shield Plans have over 58 million members and some of your patients may be members of out-of-state Plans.

When reporting your services rendered to out-ofstate Blue Shield members you may use our Physician's Service Report Form and mail it directly to the headquarters city of the Blue Shield Plan listed on the identification card of your patient.

Each Blue Shield Plan provides allowances only for its own members. Therefore, sending the report directly to the Plan involved will avoid undue delays.

County Medical Societies Have Blue Shield

Forty-three county medical societies in Illinois have Blue Shield coverage for their members a recent survey shows. Some contracts include doctors' employees and others are written for members only.

The scope of benefits varies with the contract purchased and the premium paid.

Nationally there are about 61,000 Blue Shield contracts outstanding covering over 103,000 members of medical society groups.

Some societies, depending upon their group size, would qualify for the Usual and Customary Plan now being offered by Illinois Blue Shield and subscribed to by the American Medical Association for its 950 employees.

Intensive Medical Care

Certain Blue Shield Certificates provide allowances for Intensive Medical Care. This is defined in our Certificates as "services of an extraordinary degree involving an excessive effort as reported by the attending physician."

Some conditions in which the physician may be required to render such service include acute myocardial infarction, massive gastrointestinal hemorrhage, diabetic ketosis with coma, acute congestive heart failure, acute encephalitis, acute or chronic nephritis with uremia, acute nephrosis, Addison's disease of the adrenals with acute crisis, massive pulmonary hemorrhage, acute laryngotracheal bronchitis of infants and children.

Therefore, when such care is given, the nature of the care should be fully described when completing the Physician's Service Report.

Federal Health Insurance Benefits under TI-TLE XVIII, Part B of P.L. 89-97 were paid during September on 39,306 cases in the counties of Cook, Du Page, Kane, Lake, and Will for a total amount of \$2,086,733. For the year to date, payments have been made on 363,858 cases for a total amount of \$22,008,042.

ASK BLUE SHIELD

Q If surgery is performed on two or more dates during the same admission, is it necessary to send a Physician Service Report for each service?

A No, Blue Shield would like to have all procedures listed on the same report whenever possible, indicating the dates services were rendered.

Q Are benefits paid for surgical excision of skin cysts and tumors when the procedure is performed in the office?

A Yes, but on the report form, we request that you indicate the approximate size and location of the area excised as payment is made on that basis.

Q Why is it necessary to describe intensive medical care?

A We wish to know the length of time you spend with the patient and number of visits you make. Certain certificates provide increased benefits for intensive medical care.

Q Does Blue Shield have a record of my "usual fees"?

A Yes, we have been paying allowances toward the bills you have sent us for many years and we do have records of the charges you have made for your services.

Q Does Blue Shield publish a handbook for physicians?

A The last one Blue Shield prepared is now out of print. However, we are in the process of updating the Physicians' Handbook and we will make it available as soon as it has been completed.

ABOUT MEDICARE

Q Is it necessary to indicate on the patient's bill that an injection has been administered during an office call?

A It is necessary for us to know that an injection has been given and the type of injection before payment can be made.

Q As an anesthesiologist what information should I provide to expedite payment?

A Anesthesiologists should always indicate the amount of time in the operating room and the surgical procedure that was performed. This will aid in expediting payments.

Q When I bill for hospital visits, what information do you require?

A Whether you accept an assignment or bill the patient directly, it is necessary for you to indicate the date of hospitalization, the dates of each visit

and the charge for each visit. If you charge more for the first visit, this should be indicated on the SSA Form 1490 or the receipted bill with a brief explanation of your initial charge.

Q Some of my patients are public aid recipients. Do I have to indicate their public aid number on the SSA Form 1490?

A Yes, the public aid number should be shown in the space in the right of the bold print, "PART 1—CLAIMS INFORMATION TO BE COMPLET-ED BY THE PATIENT," of SSA Form 1490.

Q Will Medicare pay for consultation by another physician?

A When the specific services of a consulting physician are necessary, they should be described in detail.

Q I am a member of the Utilization Review Committee in my hospital. Should I review my own cases?

A Public Law 89-97 specifically prohibits the review of a case by a physician who personally attends the patient.

Q How can I obtain a Medicare claim number for public aid recipients?

A Many physicians, hospitals, and suppliers of services have had difficulty in obtaining a Medicare Health Insurance Benefit (claim number) from public aid recipients who qualify for Medicare benefits. All county public aid departments now receive PUBLIC AID AUTHORIZATION FORM FO-552. This form contains both the Medicare claim number and the public aid identification number and is available from the county public aid office.

Our Government Contracts Division, which handles our medicare responsibilities, recently conducted a study and found that many claims were temporarily rejected because of incorrect beneficiary names and Health Insurance Benefit (HIB) numbers.

The number of temporarily rejected claims can be reduced by double checking the beneficiary name and HIB number to make sure it matches exactly the name and number shown on the patient's HIB card.

Whether you accept an assignment or bill your patients directly, Form SSA-1490 may be used which provides space for all information necessary to process a claim.

Omitted essential information necessitates a follow-up call or letter which delays payment to you or to your patient.

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Before prescribing, please consult complete product information, a summary of which follows: Contraindications: Patients with known hypersensitivity to the drug.

Warnings: Caution patients about possible combined effects with alcohol and other CNS depressants. As with all CNS-acting drugs, caution patients against hazardous occupations requiring complete mental alertness (e.g., operating machinery, driving). Though physical and psychological dependence have rarely been reported on recommended doses, use caution in administering to addiction-prone individuals or those who might increase dosage; withdrawal symptoms (including convulsions), following discontinuation of the drug and similar to those seen with barbiturates, have been reported. Use of any drug in pregnancy, lactation, or in women of child-bearing age requires that its potential benefits be weighed against its possible hazards.

Precautions: In the elderly and debilitated, and in children over six, limit to smallest effective dosage (initially 10 mg or less per day) to preclude ataxia or oversedation, increasing gradually as needed and tolerated. Not recommended in children under six. Though generally not recommended, if combination therapy with other psychotropics seems indicated, carefully consider individual pharmacologic effects, particularly in use of potentiating drugs such as MAO inhibitors and phenothiazines. Observe usual precautions in presence of impaired renal or hepatic function. Paradoxical reactions (e.g., excitement, stimulation and acute rage) have been reported in psychiatric patients and hyperactive aggressive children. Employ usual precautions in treatment of anxiety states with evidence of impending depression; suicidal tendencies may be present and protective measures necessary. Variable effects on blood coagulation have been reported very rarely in patients receiving the drug and oral anticoagulants; causal relationship has not been established clinically.

Adverse Reactions: Drowsiness, ataxia and confusion may occur, especially in the elderly and debilitated. These are reversible in most instances by proper dosage adjustment, but are also occasionally observed at the lower dosage ranges. In a few instances syncope has been reported. Also encountered are isolated instances of skin eruptions, edema, minor menstrual irregularities, nausea and constipation, extrapyramidal symptoms, increased and decreased libido—all infrequent and generally controlled with dosage reduction; changes in EEG patterns (low-voltage fast activity) may appear during and after treatment; blood dyscrasias (including agranulocytosis), jaundice and hepatic dysfunction have been reported occasionally, making periodic blood counts and liver-function tests advisable during protracted therapy.

Usual Daily Dosage, Individualize for maximum beneficial effects. Oral — Adults: Mild and moderate anxiety and tension, 5 or 10 mg t.i.d. or q.i.d.; severe states, 20 or 25 mg t.i.d. or q.i.d. Geriatric patients: 5 mg b.i.d. to q.i.d. (See Precautions.)

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Illinois Medical Journal

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indications: Hypertension and many types of edema involving retention of salt and water.

Contraindications: Hypersensitivity and most cases of severe renal or hepatic disease.

Warning: With the administration of enteric-coated potassium supplements, which should be used only when adequate dietary supplementation is not practical, the possibility of small bowel lesions (obstruction, hemorrhage, and perforation) should be kept in mind. Surgery for these lesions has frequently been required and deaths have occurred. Discontinue enteric-coated potassium supplements immediately if abdominal pain, distention, nausea, vomiting, or gastrointestinal bleeding occur.

Use with caution in pregnant patients, since the drug may cross the placental barrier and adverse reactions which may occur in the adult (thrombocytopenia, hyperbilirubinemia, altered carbohydrate metabolism, etc.) are potential problems in the newborn.

Precautions: Antihypertensive therapy with Hygroton should always be initiated cautiously in postsympathectomy patients and in patients receiving ganglionic blocking agents or other potent antihypertensive drugs, or curare. Reduce dosage of concomitant antihypertensive agents by at least one-half. Barbiturates, narcotics or alcohol may potentiate hypotension. Because of the possibility of progression of renal damage, periodic determination of the BUN is indicated. Discontinue if the BUN rises or liver dysfunction is aggravated. Hepatic coma may be precipitated.

Electrolyte imbalance, sodium and/or potassium depletion may occur. If potassium depletion should occur during therapy, Hygroton should be discontinued and potassium supplements given, provided the patient does not have marked oliguria.

Take special care in cirrhosis or severe ischemic heart disease and in patients receiving corticosteroids, ACTH, or digitalis. Salt restriction is not recommended.

Adverse Reactions: Nausea, gastric irritation, vomiting, anorexia, constipation and cramping, dizziness, weakness, restlessness, hyperglycemia, hyperuricemia, headache, muscle cramps, orthostatic hypotension, aplastic anemia, leukopenia, thrombocytopenia, agranulocytosis, impotence, dysuria, transient myopia, skin rashes, urticaria, purpura, necrotizing angiitis, acute gout, and pancreatitis when epigastric pain or unexplained G.I. symptoms develop after prolonged administration. Other reactions reported with this class of compounds include: jaundice, xanthopsia, paresthesia, and photosensitization.

Average Dosage: One tablet with breakfast daily or every other day.

Availability: White, single-scored tablets of 100 mg. and aqua tablets of 50 mg., in bottles of 100 and 1000. (B)46-230-D

For full details, please see the complete prescribing information.



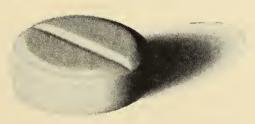
Geigy Pharmaceuticals Division of Geigy Chemical Corporation Ardsley, New York

Here's the Hygroton they don't have to halve



New Hygroton 50 mg. from Geigy

to go with the Hygroton 100 mg. you know



The president's page



Newton DuPuy, M.D.

One of the definitions of public relations is "doing a good job and getting credit for it."

Too many of us, I'm afraid, still think that doing a good job in a professional way is enough. If this were true, we wouldn't be constantly struggling a gainst the pressures of socialization. The fact is that today it is not enough to do a competent, or even a superior, professional job; we must work almost as hard to have that competence recognized—to get credit for doing a good job.

In other days the physician did not have to worry about public relations. The horse and buggy doctor was his own PR man; he maintained his image by taking care of whole families whom he knew intimately.

But just as we have discarded horse and buggy medicine, we must now discard horse and buggy attitudes toward public relations, recognizing what it is doing for us now and what it can do for our profession—if we co-operate individually and collectively.

The idea of a doctor needing a PR man may be abhorrent, and *image* may seem like only an overworked term from Madison Avenue that has no application to the art and science of healing. But we cannot afford to maintain such an aloof attitude. The very life of our profession depends on our developing modern methods in all our affairs.

The Principles of Medical Ethics require us to seek consultation "whenever the

quality of medical service may be enhanced thereby." Who can deny that seeking professional public relations help to hold onto vestiges of freedom in the practice of medicine will enhance the quality of service?

It is the responsibility of a medical society not only to help its members do a good job-and this kind of help is necessarily limited—but also to help the physician get credit for doing that good job. For that reason, the Illinois State Medical Society maintains a Division of Public Relations to provide us with professional assistance. We are fortunate in having as head of this division a very capable young man named Jim Slawny, who has already demonstrated his capabilities in several places around our state where the medical profession has been made to look less than honorable. In these instances, Jim and his staff have gone in with a positive public relations program that not only smoothed the troubled waters of the immediate area, but have boosted the profession in general.

Recently Dr. Thomsen and I have had a unique opportunity to see such a positive program in action and it has been a most gratifying experience. Jim and his staff have set up for us a number of speaking engagements around the state where we have not only met our colleagues, learned some of their problems and explained some of our policies, but we have also appeared before civic groups, met with members of the press, and have been allowed to tell

(Continued on page 692)



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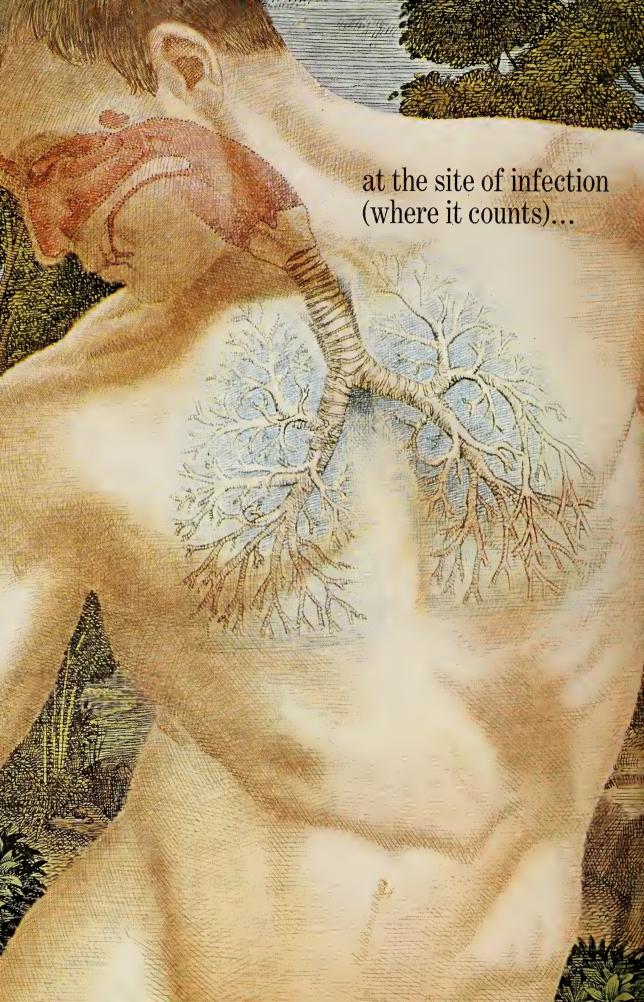
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helps solve "the other problem" in venereal disease

The "other problem" in venereal disease is the sensitivity of many patients to penicillin and the increased resistance of the gonococcus.

Regarding Increased Resistance—During the last eight years, 5700 strains of *N. gonorrhoeae* have been isolated and tested for sensitivity to penicillin and sulfadiazine in the Public Health Laboratory (Toronto). (1) In the six-month period of January to June, 1966, no less than 18.8 per cent of the *N. gonorrhoeae* strains isolated required 1.0 unit of penicillin per ml to inhibit their growth; and 8.6 per cent required more than 1.0 unit. In contrast, only eight years ago, 98 per cent of the isolates were sensitive to 0.1 unit of penicillin or less.

<u>Regarding Sensitivity</u>—It has been reported that approximately 15 per cent of all patients admitted to a large hospital have a history of being allergic or hypersensitive to penicillin. It likewise has been stated that conventional skin testing with penicillin is not reliable and that more elaborate testing for sensitivity is not readily available. (2)

Regarding DECLOMYCIN—Excellent results have been achieved with DECLOMYCIN as a therapeutic alternative in a series of studies (3-8) representing a cross-section of national experience (Los Angeles, California; Columbia, So. Carolina; Houston, Texas; New York, New York; Boston, Massachusetts and Washington, D.C.). 1931 patients received DECLOMYCIN for treatment of acute gonorrheal urethritis. The overall cure rate achieved was 89 per cent!*

In syphilis, dosage schedules of a total of 12 to 18 Gm given in equally divided doses over a period of 10 to 15 days should be followed.

*The above studies utilized DECLOMYCIN in a variety of dosage schedules. The recommended adult dosage of DECLOMYCIN is 600 mg divided into two or four doses daily.

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Canad. Med. Ass. J. 96(1):33 (Jan.7) 1967. 2. Garagusi, V. F.: Antibiotic Review. Amer. Fam. Phys. 11:61 (Nov.) 1966. 3. Sokoloff, B.: Demethylchlortetracycline Therapy in Acute Gonococcal Urethritis.

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Unpublished data on file, Medical Research Section, Lederle Laboratories.



for November, 1967 665

helps solve "the other problem" in venereal disease

Effective in a wide range of everyday infections—respiratory, urinary tract and others—in the young and aged—the acutely or chronically ill—when the offending organisms are tetracyclinesensitive.

Contraindication: History of hypersensitivity to demethylchlor-tetracycline.

Warning—In renal impairment, usual doses may lead to excessive accumulation and liver toxicity. Under such conditions, lower than usual doses are indicated, and, if therapy is prolonged, serum level determinations may be advisable. A photodynamic reaction to natural or artificial sunlight has been observed. Small amounts of drug and short exposure may produce an exaggerated sunburn reaction which may range from erythema to severe skin manifestations. In a smaller proportion, photoallergic reactions have been reported. Patients should avoid direct exposure to sunlight and discontinue drug at the first evidence of skin discomfort. Necessary subsequent courses of treatment with tetracyclines should be carefully observed.

Precautions—Overgrowth of nonsusceptible organisms may occur. Constant observation is essential. If new infections appear, appropriate measures should be taken. In infants, increased intracranial pressure with bulging fontanels has been observed. All signs and symptoms have disappeared rapidly upon cessation of treatment.

Side Effects—Gastrointestinal system—anorexia, nausea, vomiting, diarrhea, stomatitis, glossitis, enterocolitis, pruritus ani. Skin—maculopapular and erythematous rashes. A rare case of exfoliative dermatitis has been reported. Photosensitivity: onycholysis and discoloration of the nails (rare). Kidney—rise in BUN, apparently dose related. Hypersensitivity reactions—urticaria, angioneurotic edema, anaphylaxis. Teeth—dental staining (yellowbrown) in children of mothers given this drug during the latter half of pregnancy, and in children given the drug during the neonatal period, infancy and early childhood (up to 12 years). Enamel hypoplasia has been seen in a few children. If adverse reaction or idiosyncrasy occurs, discontinue medication and institute appropriate therapy.

Average Adult Daily Dosage: 150 mg q.i.d. or 300 mg b.i.d. Should be given 1 hour before or 2 hours after meals, since absorption is impaired by the concomitant administration of high calcium content drugs, foods and some dairy products.

Capsules: 150 mg; Tablets: film coated, 300 mg, 150 mg, and 75 mg of demethylchlortetracycline HCl.

DECLONIYCING DEMETHYLCHLORTETRACYCLINE



LEDERLE LABORATORIES, A Division of American Cyanamid Company, Pearl River, New York

Celebrities Become Mothers' Helpers

Three young celebrities with a unique appeal to all ages—Connie Francis, Greta Thyssen and Emilia Conde—are about to become mothers' helpers.

The three stars have donated their talents as a public service to a nationwide radio campaign on home safety by the Council on Family Health.

They have recorded 10- to 30-second messages to be produced in an album and distributed by the Council to more than 1,000 radio stations throughout the nation.

Miss Francis, Miss Thyssen and Miss Conde have added their voices to those of four other entertainment stars—Danny Thomas, Lorne Greene, Donna Reed and Eddie Albert—who previously recorded messages for the Council's campaign.

The Council on Family Health is a nonprofit organization established as a public service by members of the drug industry to promote home safety and family health.

Dr. Howard Prentice, president of the Council, pointed out that there are 28,000 fatalities due to accidents in and around the home during a year.

"Guarding against accidents in the home means families—particularly mother, because she is guardian of the family health—must be constantly alert against hazards," Dr. Prentice said.

As a further means of fulfilling its role of encouraging young men and women to enter careers allied to medicine, the American Medical Association is developing a new film, "Horizons Unlimited," which is expected to be available for distribution this fall.

Designed to tie in with the association's paperback of the same name, the film, developed in a hospital setting, will depict approximately 12 rewarding careers in the health field and call attention to the wide variety of others.

"Horizons Unlimited" will be produced in color and will run approximately 28 minutes. It will become the only recently produced film covering a broad variety of health career opportunities and is intended to replace the time-worn film, "Helping Hands for Julie," developed by the AMA and American Hospital Association through a grant from E. R. Squibb and Company, in 1958. The new film is being developed exclusively by the AMA.



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The DuPage County Preceptorship Program

A Pilot Program

By Norman M. Frank, M.D. / Clarendon Hills

On June 26, 1967, the Chicago Medical School and the DuPage County Medical Society launched a pilot preceptorship program. The dean, Dr. LeRoy P. Levitt, filed a request for the institution of this program with the Illinois State Medical Society and it in turn assigned the project to DuPage County.

It is organized as a fully accredited 12week (one quarter) course issued as an elective to senior students.

A preceptorship committee, consisting of one member from each of the hospitals in the county, directs the program. They are: Dr. James P. Campbell — Central DuPage Hospital, Winfield, and Community Hospital, Geneva.

Dr. J. M. Stoker – Memorial Hospital of DuPage County, Elmhurst.

Dr. Charles G. White — Edward Hospital, Naperville.

Dr. Norman M. Frank — Hinsdale Sanitarium and Hospital, Hinsdale.

The committee selects a roster of preceptors from their hospital staffs.

GOALS

The primary goal of this preceptorship program is to afford the medical student a learning experience that will prove valuable to him the remainder of his days in the medical profession.

We hope to achieve this objective by demonstrating the clinical practice of medicine as carried out by the physician in private practice at his office, his local hospital and his community.

During this teaching experience, the preceptorship program will attempt to cover the material in the outline of the "Core Content of Family Medicine," as follows:

- I. Clinical Aspects
 - A. Physician-patient relationship
 - B. Preventive medicine
 - C. Diagnosis
 - D. Treatment
 - E. Techniques—Diagnosis, therapy and management
 - F. Rehabilitation
 - G. Consultation and referrals
- II. Sociological Aspects
 - A. Family and community
 - B. Community resources
 - C. Allied and paramedical personnel
- III. Ethical and Legal Aspects
 - A. Interpersonal relationships
 - B. Interprofessional and intraprofessional relationships
 - C. Statutory and regulatory duties
 - D. Legal duties and responsibilities
- IV. Administrative and Economic
 - Aspects
 A. Patterns of practice
 - B. Office management
 - C. Record systems
 - D. Health service
 - E. Insurance and prepayment plans
- V. Continuing Education
 - A. Goals
 - B. Methods

By giving the student a one month's assignment to each preceptor, an attempt is made to have the student gain experience in the continuity of medical care. In many cases he will be able to follow the patient from the office to the hospital, to his home or extended care facility.

The student will have an opportunity to observe that the majority of patients in the nation are not seriously ill and that the largest sector of medical practice is carried on in the office. This experience should give him a greater perspective than training programs that are only hospital based.

Thus he will gain experience in techniques that are not usually a part of hospital programs but often prove essential in the practice of medicine.

For the student who plans to enter the clinical practice of medicine, this program may help to reinforce his goals by giving him realistic experience in the field. It will aid him in selecting his type of practice—solo, partnership or group; location—rural, suburban, urban; and field of practice—general or specialty.

For the student who does not intend to enter clinical practice but plans to enter the academic, administrative or research fields, this program may be the only opportunity in his medical career to observe the clinical practice of private medicine. His future career may call for him to render opinions and judgments regarding the practice of medicine with no base of experience upon which he may draw.

By viewing patients in their community environment, we hope that they will be given an identity as people rather than as cases in the eyes of the student. We will attempt to bring out or restore the desire to help people that motivated most students to choose a medical career. We will try to "humanize" the student in relationships with patients now and in the future.

The varied human problems that the patients present should have a broadening, tolerant and maturing effect upon the student.

THE PROGRAM

The student spends one month with each preceptor during the 12-week course. One day each week may be spent with a specialist of his choosing. One of these elective days must be with the pathologist and another with the radiologist.

A. Hospital

1. Rounds

The medical student will accompany his preceptor on daily rounds on arrival at the hospital. They will visit each of the preceptor's hospitalized patients and discuss diagnosis and management. The student may be assigned material to review in the library and/or literature that may be pertinent to the case discussed. Associated laboratory, x-ray and pathological specimens will be examined and assessed. The preceptee will be expected to participate actively in the case under consideration, under the direct supervision of the preceptor.

The preceptor assigns specific hospitalized patients to the student for study. The student will do a complete history and physical examination, determine what studies may be needed and suggest a course of management. When the above is completed he will present this material for discussion and review by his preceptor. Changes, if needed, will be made and they will then follow the progress of this patient together.

An abstract of one case will be presented by the student at a hospital staff or one of the department meetings.

2. Surgery

Should the preceptor engage in surgery, the medical student will "scrub" and assist at the surgical table. He will be instructed in the preliminary routines of the operating room. He will be shown how to assist the surgeon. The case at hand will be reviewed and the student will be queried on diagnosis and management. Pre- and post-operative care will be delineated. The associated anatomy and pathology will be demonstrated and discussed. The student may be asked to study and report on any areas suggested by the surgical cases. In addition, he may be asked to practice elementary surgical techniques at home, such as tying knots and learning to identify the various surgical instruments. The student may be allowed to carry out elementary surgical procedures such as suturing wounds, removing sutures, incision and drainage of small abscesses, cautery of verrucae, etc., under the direct supervision and responsibility of the preceptor.

3. Obstetrics

Under the guidance of the preceptor, the student will follow the progress and assist at the delivery of any of his obstetric cases. During this time the preceptor will explain the dynamic mechanism of the patient in labor and delivery. The post-partum course of the mother and the post-natal course of the baby will be observed on daily rounds. The attending physician's orders will be explained. He will assist in the examination and care of the newborn; and also be taught circumcision techniques.

4. Hospital Activities

The student will accompany his preceptor and participate in the hospital programs.

a. Department meetings. This consists of discussions regarding the operation of the clinical department and a scientific review of associated cases. Most hospitals have departments of medicine, surgery, obstetrics, pediatrics, and general practice. Often the monthly general staff meeting will have a scientific program as well as a business meeting.

b. Clinical pathological conferences

c. Basic science conferences

d. X-ray conferences

e. Pathology conferences

f. Out-patient clinic. Operated for the training of the house staff and the care of indigent patients of the community

g. Well baby clinic. Operated by the local

welfare department

h. Grand rounds. Operated by the clinical departments

B. Office

The student will accompany the preceptor to his office and see the patients scheduled for that day. As at the hospital, cases will be reviewed and discussed. Should an occasional patient balk at this arrangement, his wishes will be honored and he will be seen without the student participating. Here too he will be assigned cases to study and report, followed by review and mutual decisions on management. Wherever possible, the preceptee will be taught office surgery, diagnostic and therapeutic procedures. Preventive medicine programs have a prominent place in family medicine office practice, as well as rehabilitation of the disabled. Consultation referrals are a part of the daily regime and require great tact. The health department and community resources augment the family physician's comprehensive care. The student should be able to watch the doctor coordinate these services in his daily office flow of activity.

Attorney communications, insurance company reports, court appearances, adoption procedures, mental illness commitments, etc., all give rise to opportunities for discuss-

ing ethical and legal problems involved in practice.

We will get involved in discourses on patient records, office records, billing techniques, accounting systems, medical equipment, office personnel and equipment, office laboratory, and office building and location. Modes of practice, such as solo, partnership and group, will be explored.

C. Public Health⁴

Every three weeks the student will spend a day with the DuPage County Health Department, Dr. Charles A. Lang, Director. These days will be structured to provide specific learning experiences. The student will be exposed to as many of the following as time will permit:

Public Health Nursing visit to a case in which various community resources are

utilized.

Community Nursing Service visit to homebound chronically ill patient with whom rehabilitation skills are employed.

Nursing visit to a homebound mentally

retarded child.

Nursing home inspection visit to evaluate the quality of sanitation and nursing care. School visit to evaluate environmental health and safety factors.

Inspection visit to restaurant or food processing plant to evaluate sanitation, safety, temperature controls in cooking, storing and dispensing foods and beverages.

Inspection visit to a water treatment plant and a sewage treatment plant to realize the concepts of the engineering processes. To attend staffing meetings in the Mental Health Center. Psychiatrists, psychologists, social workers and public health nurses in team fashion discuss individual cases—diagnosis, therapy, follow-through, prognosis.

prognosis.
To attend group therapy sessions in the Mental Health Center.

To discuss public health administration with Dr. Charles A. Lang, the Director of the department. e.g., the planning for improved or new community health services with the Board of Health and the County Board of Supervisors; county-wide mosquito abatement act; long range water conservation program; industrial hygiene ordinance; venereal disease program; relationship of department with community hospitals and other health and welfare agencies.

D. Professional and Community Activities

The student will join his preceptor at his professional organizational meetings such as

the county medical society meetings, general practice or specialty meetings and conventions. Many of the physicians belong to and attend community meetings such as school boards, school medical advisory committees, school lectures on health or sex education, team physician at athletic events, juvenile problem committees, religious-community efforts. It would benefit the student to attend these meetings and note the physician's role in the community. Arrangements will be made for the student to speak before one lay group during the quarter.

E. House Calls and Emergencies

The student will accompany his preceptor on all house calls during the day. He will also join him on night house calls, medical and surgical hospital emergencies and deliveries at any hour. He must be on call at least three nights a week. Saturday afternoon and Sunday is free time. These hours shall be reasonably flexible.

F. Working Hours

In general, an attempt will be made for the student to work the same amount of time as his preceptor in order to familiarize him with the realistic demands of practice. During the week he will remain with the preceptor during the day and may return for evening office hours if he chooses. He has week-ends off and night calls as described above (E).

G. Stipend

Students participating in this program shall receive a stipend of \$250 a month for his board and other expenses. Housing will be provided.

H. Housing

Room will be provided for the student by the local hospital at or near its premises. Where such accommodations are not available, the doctors in the community have offered to provide room for the student. The student may be lodged in the home of the preceptor if this arrangement is agreeable to both parties. Husband and wife housing will be available on several hospital campuses. Again, arrangements will be flexible to suit the need.

I. Board

Arrangements will be made for the student to purchase his meals at the hospital if he wishes.

J. Transportation

The student will be responsible for his own transportation to and from the county during the twelve week period of the course. The preceptor will provide transportation for the student while he is on duty in the program.

DIRECTIONS TO THE STUDENT

1. The student should call each of his preceptors well in advance of the beginning of his course to set up the date, time and location for their meeting to start the program.

2. The student is to work under the supervision of his preceptor. He is not to receive compensation for patient care or any expen-

sive gifts.²

3. The student will maintain a personal "log" of his experiences while engaged in the program. An attempt will be made not to duplicate assignments and to offer the widest possible range of activities for the participants.

4. The student will receive a questionnaire at the end of each phase of the program in which he will evaluate the preceptor

and the program.

5. Should any problems arise during the course of the program, the student should discuss them with the preceptorship committee representative at the hospital.

DIRECTIONS TO THE PRECEPTOR

- 1. The student is not a licensed physician. Therefore, he must work under the *direct supervision* of the preceptor. The preceptor assumes responsibility for the student's activities.²
- 2. He may be addressed as "doctor" but the patients are to understand that he is a student under the tutelage of the physician.²
- 3. He should not be occupied as a clinical clerk or as an assistant in surgery to other physicians in the neighborhood, or as a laboratory assistant.²
- 4. The student should not sleep at the office nor in any way perform as a locum tenens. He should not accept payment for services rendered. He should not be given expensive gifts or be entertained. The doctor's family should try to maintain its usual mode of living.²

Dr. Frank is chairman of the DuPage County Medical Society's preceptorship program. He is also clinical associate professor of medicine at the Chicago Medical School, a member of the American Academy of General Practice, and he is on the attending staff at Hinsdale Sanitarium and Hospital.

- 5. The preceptor may have the student in his home. He would then provide room and board.
- 6. It is advisable that the preceptor reduce his work load during the time he has a student so that he may devote more time and attention to teaching.³
- 7. Advance notification of patients, either by letter or sign in the office, smooths the way and saves time on explanations.
- 8. It is not a wise policy to proselytize the student towards an internship, family practice, or any specialty field. The student will have no difficulty in seeing the merits of any of these. Of course, he is to have all his questions answered in a forthright manner.
- 9. The preceptor should make the arrangements for the student for the days he spends with specialists.
- 10. The preceptor will be asked to observe the performance of the student and later render an evaluation on the "Preceptorship Evaluation Form."
- 11. Should any problems arise during the course of the program, they should be submitted to the preceptorship committee representative at the hospital.

THE PRECEPTORSHIP COMMITTEE

The committee is comprised of one doctor from each of the hospitals in the county, selected by the DuPage County Medical Society from among members in good standing.

The committee is charged to organize, operate and supervise the preceptorship pro-

gram. They are to create guidelines for its function. They are to meet regularly and report their activities to the county medical society and work cooperatively in conjunction with the sponsoring Illinois State Medical Society.

The program is to be constituted to the specifications of the participating medical school. The committee will meet and confer with the Dean and his representatives to carry out the above provisions.

The committee will recruit the faculty of preceptors from the hospital staffs in the county to teach in the program.

Each committee member shall be responsible for the operation of the preceptorship program in his hospital.

The committee will make the preceptorpreceptee assignments. Should either party prove to be dissatisfied with their arrangements or assignments, they should report the problem to the preceptorship committee representative at the hospital for aid.

The committee will obtain data from the preceptor and preceptee at the completion of various stages in the program to evaluate the student, the preceptor and the effectiveness of the program.

Grading of the student will be carried out at the direction of the medical school.

RECRUITMENT OF PRECEPTORS

Each hospital in the county should develop a roster of family physicians and specialists willing to serve as preceptors.

PRECEPTORSHIP EVALUATION FORM5

Preceptor	Hospital				
Student	Quarter 19				
Please fill in the blanks as follows:	The state of the s				
Outstanding 5, Superior 4, Good 3, Adequa	te 2, Inadequate 1.				
PERFORMANCE	PERSONAL TRAITS				
Knowledge	Appearance				
Judgment	Attitude toward:				
Initiative	Patients				
Administrative	House staff				
Performance	Attending staff				
Participation:	Integrity				
Conferences	Attendance				
Rounds	Emotional Maturity				
Overall Performance	Ability				
If you were asked to do so, how would you	recommend this student?				
Highly recommend	Do not recommend				
Recommend	Do not know				
Recommend with reservations					
Comments: (Please use other side for more s	space)				

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The men should be selected primarily for their ability to teach and their willingness to devote the necessary demands of time for this project. The preceptor will have to reduce his patient load or shift patients to his associates in order to make the extra time for teaching. The preceptorship committee member will compile the roster from his hospital staff. He is also in charge of administering the program at his hospital. He should obtain formal permission from the hospital staff and administration to allow the student to function as a preceptee at that hospital. This will allow him to function in all areas of the hospital under the supervision of his preceptor.

The medical school has requested that all preceptors submit an application to the medical school. In turn, appointments have been made to its faculty.

COMMENT

A preceptorship is primarily a presentation of the clinical practice of medicine in all its major components, i.e., the home, the office and the hospital. It extends the walls of the medical school into the community and trains the medical student to become a well rounded, highly integrated clinician.

For this we hope to develop and sharpen certain needed abilities. First, he must communicate. He must get the patient's story the spoken and the unspoken. He interprets gestures, voice inflection, posture, etc. Then he has to be able to have the patient willingly carry out his prescriptions. He needs keen observation. One sweeping look in a house should tell the astute clinician volumes; such information as sanitation, economic status, education, sources of allergens, the amount of effort needed to care for the place, etc. He will need to integrate the information, formulate a diagnosis and set a therapeutic course. To do this, he must draw upon a vast store of accumulated information that has been modified and honed by years of experience. He needs humility to seek the aid of his colleagues when he recognizes the need for help. Courage is essential to be able to act upon the decisions required of the practicing physician. His integrity will allow patients to confer their faith and trust. Finally, he must be diligent and conscientious for even the most brilliant physician is of no value to the community if he is unavailable, unreliable or untrustworthy.

There are very few places in the curriculum where all these traits can be observed, tested and measured.

Preceptorship is the oldest of all the medical teaching methods. Like many things in medicine it is now enjoying a re-discovery for the positive things it has to offer. In the program, the student in essence receives private tutoring for twelve weeks. One month with a preceptor is equivalent to 160 hours of teaching. When compared to a one hour five-day-week class, this would amount to 32 weeks or eight months in one course. With this duration of exposure the student and preceptor should know each other as well or better than previous courses allow. The student's strengths and weaknesses are readily uncovered and recognized by him and his instructor. In this close relationship the student may find a confidente to help guide him in his future medical career.

By extending its walls into the community, the medical school is able to tap a fertile territory for teaching. Their students are projected from a cloistered atmosphere into the milieu of private practice. The student becomes private witness to the problems peculiar to the office and hospital. Just the exchanges in the corridors and doctors' lounge might prove worth the whole course.

The course is particularly suited to the senior medical student for he is in effect an undifferentiated physician. At this juncture the family physician is his logical tutor. This method of teaching places the family physician in the medical curriculum on his home territory where he performs at his best.

This program, in order to succeed, requires considerable effort from the doctors and the medical school involved. We have had the good fortune to have enthusiastic support from both. Conversely, those who attempt such a program and render token and half-hearted support are doomed to dry and die. With this preceptorship program, Dean Levitt and his staff have added a strong pillar to their comprehensive medical care curriculum.

Finally, this teaching experience stimulates the student to give the preceptor his best. The preceptor is placed on his mettle to meet the challenges of his student. The participating hospital tries to present a showcase for the program. The net effect is that the people receive the finest its medical community has to offer.

SUMMARY

The DuPage County's pilot preceptorship program, prepared and operated for the Chicago Medical School and sponsored by the Illinois State Medical Society has been presented in detail. It is a fully accredited twelve week course offered to senior students during their elective quarter. Each preceptor tutors the student for one month. Thus, the student is exposed to a family physician in at least three of the four hospitals in the county. He accompanies his preceptor at the hospital, in the office and on house calls. Four times during the course the county health officer describes and sends him on a tour of the various community health facilities. The student also participates with his preceptor in medical organizations as well as community programs. He is specifically required to give a health lecture to a lay

audience and a case presentation to the medical staff. After completing the course the student and preceptor evaluate each other.

The responsible officers of the Illinois State Medical Society will decide if, when and how this program should be expanded and by what mode it will be funded.

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Blue Shield Urges Greater Use of Private Sector in Medicare and Medicaid

The National Association of Blue Shield Plans states that complications in the Medicare and Medicaid programs can be lessened through greater use of the private sector.

The association's views on the two government-financed health care programs were presented recently by Dr. Ira C. Layton, vice chairman of the board of NABSP, in testimony before the Senate Finance Committee in Washington, D. C., on H.R. 12080, the Social Security Amendments of 1967.

Dr. Layton, a practicing physician in Kansas City, Mo., pointed out that a "comprehension gap" on Medicare still exists. He added that every effort must be made to simplify the program through administrative changes and greater use of the experience and capabilities of the private carriers involved in the program.

Observing that a recently implemented Medicaid program is being purchased from one of the Plans with federal-state funds, Dr. Layton said he believed that Blue Shield was beginning to be used to its fullest extent under this program. He urged a continuation of this trend, explaining:

"Only in this way can Blue Shield Plans serve the public under government programs with the same degree of efficiency, economy, and satisfaction that we have achieved in serving our more than 60 million regular subscribers." Thirty-three Blue Shield Plans are now serving as Part B carriers under Medicare for 60 per cent—about 10 million—of the aged beneficiaries. These Plans are processing Medicare claims at a rate of 30 million bills a year.

Under the federal-state Medicaid program, 12 Blue Shield Plans are involved. They are processing Medicaid claims at a rate of 25 million bills a year.

With specific reference to the Medicaid program, the Blue Shield spokesman said that many of the Nation's needy are already receiving cash assistance under five welfare programs. Then Blue Shield asks:

"If these individuals are receiving cash benefits to purchase the basic necessities of life, why can't assistance be provided by participation in the purchase of needed health care coverage for those who cannot afford it?"

Blue Shield said it was encouraged by "a growing conviction in Congress" that many of the Nation's social problems cannot be solved by government alone.

"These problems also need the vigor, expert knowledge, and capabilities of the private sector, which is the basic strength of our nation," the Blue Shield spokesman said.

Dr. Layton urged that a study be made on the feasibility of utilizing the private sector

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The Partnership Of The Department Of Public Health, Medicine, And Hospitals In The Care Of Obstetrical And Gynecological Patients In Hospitals

By Franklin D. Yoder, M.D./Springfield

This opportunity to delineate the effective partnership of public health, private medicine and hospitals in the care of obstetrical and gynecological patients is welcomed. While each of us has definable activities, we are interdependent and mutually supportive, with complementary roles to enact. Long ago we joined hands in our efforts to provide the best care possible. Over the past two decades this has been demonstrated in countless ways.

Many important examples of our partnership since World War II have been based upon law and regulation and others have been primarily educational, consultative and promotional in nature. Some of the activities had relationship to federal agencies, laws and programs, while others were more specifically of state origin. Still others originated with private agencies such as the Illinois State Medical Society and the Illinois Hospital Association. But in all cases without exception, it can be said that the real measure of their success depended on the extent to which they represented an effective partnership for health.

In Retrospect

To list some of our significant partnership activities through the years in this special area:

Beginning in World War II, the Emergency Maternity and Infant Care Program

was an early example of federal-state-physician-hospital cooperation in payment for care of mothers and infants of armed services personnel.

- Maternal death studies, beginning in 1948 under the aegis of the Maternal Welfare Committee of the Illinois State Medical Society, with dedicated leadership of obstetricians on our Department staff and cooperation of the practicing physicians and hospitals.
- Maternity hospital licensing law was enacted in 1939 and subsequent regulations were developed out of the joint concern of public health and of physicians about the types of hospital facilities and equipment and the quality of care of mothers and newborn infants in hospitals. Under these regulations, licensing of maternity divisions of general hospitals was started in 1940. This licensure responsibility became more and more significant as hospital deliveries became an ever-increasing percentage of total births. In 1943, only 87.56 percent of 156,059 total births occurred in hospitals; while in 1965, 98.5 percent of the 208,999 total births were in hospital maternity departments.
- Vital statistics registration functions is yet another illustration with provisions being made over the years for the collection of significant data on births, stillbirths, and deaths.
- Epidemiological laboratory and hospital nurse consultant services to hospitals and their obstetric medical staffs in outbreaks of infectious diarrhea of the newborn—a matter of serious concern a few short years ago and a situation in which public health physician and hospital resources and effort were combined to bring about effective control measures in actual outbreaks and educational efforts to prevent others.

Presented at the Annual Meeting, Illinois State Medical Society, May 23, 1967, Chicago, by The Illinois Department of Public Health, Franklin D. Yoder, M.D., M.P.H., Director; D. F. Rawlings, M.D., M.P.H., Chief, Division of Preventive Medicine; R. F. Sondag, M.D., M.P.H., Chief, Division of Hospitals and Chronic Illness; George A. Lindsley, M.P.H., Chief, Bureau of Hospitals, and John H. Rendok, M.D., Consultant in Obstetrics.

• Public health nurse and public health physician assistance to hospitals and their obstetric medical staffs in numerous educational activities, such as parents' classes in hospitals, special courses in premature infant care and nursing, to mention a few.

• Public health participation with physicians, nurses, and hospitals in the establishment and conduct of the First Illinois Congress on Maternal and Infant Health (held in Springfield in 1957) and conducted annually since that time.

• The Hill-Burton Hospital and Medical Care Facilities Survey, Planning and Construction Program which, in the years since 1946, has participated in nearly 300 projects and has assisted many communities to provide modern hospitals in which you now care for your patients. This has been a most effective demonstration of a federal-state-local partnership for health.

• The General Hospital Licensing Program, which since 1953 has had a considerable impact upon the facilities, organization, staffing, and operation of the hospitals in which you work. Most obstetricians-gynecologists in Illinois care for their patients in modern, well-equipped, accredited hospitals. The Hill-Burton and the Hospital Licensing Programs have contributed substantially to the existence and quality of these hospitals.

• This list could include such additional activities as the Premature Infant Care Program, Migrant Health Program and the PKU Program, each of which has, in some particular way, made a significant contribution to the high-quality care of mothers and their newborn infants and to the care of gynecological and other patients. But most important—each of these activities was accomplished as a result of our partnership in health.

Clean Gyne Program

One of the most recent developments which should be emphasized is the approval program for the admission and care of selected clean gynecological patients in hospital obstetrical units. This has become an action program which has made possible a fundamental change in the organization and operation of hospital maternity departments and has had a great impact upon the practice of obstetrics and gynecology. It represents a real accomplishment of the effective partnership of public

health, of physicians, and of hospitals. It is a program which demonstrates what can be done, through our joint efforts, to discard anachronistic practices and adapt to new ways of organizing and delivering health care.

The historical perspective necessary to an understanding of this matter may be called to your attention, very briefly, by reminding you that in the past three or four decades the general hospital has become the focal point of the care of the mother and her newborn infant; that as hospital deliveries increased in number and, therefore, in importance to the practice of medicine, there was an increasing emphasis on the part of physicians and of public health to establish voluntary standards relative to the physical facilities, organization, staffing, and operation of hospital maternity departments. These voluntary standard-setting agencies included the:

American College of Obstetrics and Gynecology

American Committee on Maternal and Child Health

American Public Health Association and its Section on Maternal and Child Health

American Academy of Pediatrics Joint Commission on Accreditation of Hospitals and others.

These voluntary agencies together with the official agencies, such as state and local health departments, and federal agencies such as the Children's Bureau and Public Health Service, established basic standards for hospital maternity departments.

The basic standard of both voluntary and official agencies hold it to be a fundamental principle of the safe care of mothers and their newborn infants in hospitals that a physically separate and separately staffed maternity department be maintained in the hospital, and that maternity cases and clean obstetric complication cases be the only cases admitted, retained, and cared for there. This principle is based upon the fact that the mother and her newborn infant are normally well individuals while at the same time, they are highly susceptible to infection. This standard remains valid today and its observance is basic to safe care.

However, the state of the science and art of public health, of obstetrics-gynecology, and of hospital administration *has*

advanced—and so it seemed appropriate that we join together in determining whether this basic standard could safely be modified. To this end, an experimental research project was initiated by the Chicago Board of Health and the Illinois Department of Public Health in 12 Chicago hospitals—in full partnership with public health, obstetrics-gynecology, and hospital administration. The experimental project was designed to find a basis on which selected clean gynecological patients could safely be admitted to and cared for in the maternity divisions of hospitals without hazard to mothers and their newborn infants. This project was conducted in the period between April, 1964, and March, 1966. An intermixture of 26,387 obstetric and 5,302 gynecologic patients was studied. Time does not permit describing the details of this research project, though this is fully described in our booklet "Housing Selected Gynecological Patients in Obstetrical Units" and copies are available to you. While the primary conclusions are few, they are highly significant.

- 1. The maternity intermixture of selected gynecologic patients in a ratio of 1:5 with obstetric patients and their newborn did not alter obstetric complications or causes of maternal and perinatal mortality, as compared to a national study group acting as a control.
- 2. The gynecologic patients in the study did not demonstrate complications or mortalities different from those ordinarily observed in a similar group on a surgical floor.
- 3. The immediate transfer off the maternity floor of morbid obstetric and gynecologic patients effectively contributed to the absence of any known evidence of mutual hazards.
- 4. Preselection gynecologic criteria for admission to the maternity unit and rigid medical and administrative control after admission is an effective method of control of gynecologic patients housed on maternity floors.
- 5. In addition to preselection of gynecologic criteria for admission to the maternity division, it was also important to stress the gynecologic patient *not* eligible for admission. These included:

- (a) Active infectious state
- (b) No patient to be transferred from any other service of the hospital to the maternity division.
- (c) None who requires radium or x-ray therapy,
- (d) None who has medical or surgical condition that will require diagnostic studies or other procedures in addition to the gynecological care and
- (e) Invasive carcinoma. The Chicago study demonstrated that there are good and valid reasons for excluding these

On the basis of the conclusions from this study, the Chicago Board of Health and the Illinois Department of Public Health made recommendations to the Illinois Hospital Licensing Board on Sept. 7, 1966, for planning and use of maternity division facilities including a modification of hospital licensing regulations to permit, under controlled conditions, the admission of selected clean gynecologic patients.

In Illinois during 1965, a total of 226 hospitals had maternity departments with a total of 4,662 maternity beds. (This is exclusive of the Cook County Hospital which had 229 beds.)

The percentage of occupancy in these 4,662 maternity beds was 54 percent-thus, on the average, 2,145 of these beds were empty. While some hospital maternity departments did have high-level average occupancy this was the exception; too many had very low-level average occupancy. Physically these departments, as they should be, were separated from other nursing units of the hospital. While some had physically flexible "swing-beds"-most did not. As to nurse staffing, most had separate staff, as they should be, but the staff was not used to its full capability in these poorly-utilized departments. The combination of under-utilized beds and inefficient use of scarce professional nursing personnel combined to make a very serious economic loss and contributed to the high cost of hospital operation.

Furthermore, it was found that numerous urban communities had as many as three general hospitals—each with a maternity department—and one or more of these departments characterized by lowutilization. In Chicago, for instance, 48 general hospitals had maternity departments and often were located in the same neighborhood—even across the street from each other.

At this same time, these 226 general hospitals had 33,581 medical-surgical beds and they were operating at an average over-all occupancy of 83.3 percent with no end in sight to these occupancy pressures. This high-level occupancy is a reflection of the increasing usage of the general hospital for patient care. Studies conducted by our Hill-Burton staff show that hospital usage has practically doubled in the past 20 years.

Thus, there were imperative patient care and economic reasons for public health, hospitals, and physicians to seek an answer to the "unused maternity bed."

The approval program for the admission of selected clean gynecological cases to these unused beds is, we believe, a significant step. If participating hospitals and their obstetric-gynecologic medical staffs will adhere to the specifications and safeguards that are asked of them, this program will make 1,700 beds available which would otherwise have to remain unused. This alone would represent a 4.2 percent increase in total general hospital beds—an increase accomplished without any loss of time or expenditure of funds. To construct and equip this number of additional beds would cost an estimated 30 to 50 million dollars.

It should be stressed that this is an approval program—it requires hospitals and their administrative, nursing, and medical staffs to agree to comply with the specifications which have been developed by our department with approval of the state Hospital Licensing Board. This is a workable and safe program *only* if the hospital administrator meets his responsibilities and if the Chief of Obstetrics and OB-gyne medical staff members fulfill their responsibilities. This again depends on our partnership activities.

Medicare

Another partnership which is assuming greater significance is Medicare. The dominant theme of Public Law 89-97 seems to be summarized in one term, "creative federalism" which is a new "Partnership

for Health," involving the federal government and the states. The federal administration in the Department of Health, Education and Welfare has resisted the temptation to turn its Medicare Program into a completely Washington-run operation. The Department of Health, Education and Welfare-Social Security Administration has delegated administration to such diverse groups as state agencies, insurance companies, and group health marking what Secretary Gardner quotes, "The beginning of partnership of great promise." "Creative Federalism" starts from the belief that total power-private and public, individual and organization, is expanding very rapidly. It is expanding because the public and the government are growing too big and too complex for any branch of the government to effectively handle alone. Thus, we need "creative localism" as well as creative federalism, because many of our critical new programs involve the federal government in joint ventures with the states and local governments. We must give more freedom of action and judgment to the people in the local community. Creative federalism is not only intended to bring together the voluntary private and governmental sector, but also endeavors to bring the government partnership closer together, federal-state-local-health-welfare-a n d others.

In Public Law 89-97, there are two unique problems: (1) there is an insistence upon quality of care which never before has been spelled out so definitely in legislation; (2) a large part of the responsibility for administration of benefits and enforcement of qualification for participation has been delegated to non-governmental voluntary channels.

In judging the effectiveness of the Illinois Department of Public Health's participation in the Medicare Program, it becomes important to look more closely at some of our new partners and their impact and influence upon us. In this regard, let us consider the following points:

(1) Medicare is an insurance benefits program to provide reimbursement for providers of health services, not a medical health care program. Public Health, in administering its responsibility of assuring high quality care, must recognize that the provision of services to the beneficiaries' benefit is the prime objective of this program.

(2) The over-all and ultimate administrative responsibility and control of the program is not under professional medical or health direction but provided by the Social Security Administration.

(3) Responsibilities between the state agency and the official voluntary organization are not clear cut, and there is also

some overlapping.

(4) Medicare in some instances requires one state agency to regulate the provider of services by another state agency. In Illinois, a State Department of Mental Health operates psychiatric institutions which are participants as providers under the Medicare Program. In this case, the Department of Public Health must certify mental health facilities.

(5) Even though Medicare is a benefits program, for the first time on a large and national scale, reimbursement is tied directly to standards for high quality care.

(6) The change in hospital accounting on the formula basis of "reasonable charges as related to costs" (RCC) should not affect the quality of care in any department of a given hospital such as the obstetric or pediatrics departments.

In separating these charges, surgery, pediatrics, obstetrics, or laboratory, becomes its own cost center and that part of the bill not covered by Medicare must be transferred to the patient, or the cost must be transferred to another third party payer. Blue Cross, for example, will need to pay the going rate when the cost accounting on the RCC formula has been accomplished.

(7) Maintaining a high level of quality care is the responsibility which must be assumed by the governing board, the medical staff and administrator of the hospital.

Title XIX

In order to present a comprehensive view of the partnership, consideration must be given to the effect of Title XIX on antepartum, delivery and postpartum care. Illinois has been in the forefront among states offering medical and hospital care of all kinds for the indigent and the medically indigent through the Department of Public Aid.

The scope of such care, under Title XIX, will remain largely unchanged so far as obstetrics is concerned. The pay-

ment to physicians under the program will increase sharply under the "usual and customary" fee policy now in effect. For all medical care it is estimated that such costs will be doubled while hospital costs will increase approximately 25 percent in the next biennium as compared with the present biennium ending June 30, 1967.

It is expected that the Department of Public Aid will continue its policy of paying for medical and hospital care for eligible persons only if such care is not otherwise available. Programs financed through other sources such as the Office of Economic Opportunity and the Children's Bureau will probably be coordinating relationships with the Department of Public Aid as funds from these other sources are reduced. It is anticipated that projects 502 and 601 in Chicago will be so involved. Project 502 provides medical and hospital care to low-income, high-risk women who have or may have complications in pregnancy or delivery. The program is carried on by the Chicago Board of Health through the Department of Public Health utilizing many Chicago obstetricians and 12 Chicago hospitals. The significant reduction this year in neonatal mortality has been a result of this partnership; such programs would benefit other areas of the state.

It is probable that school health examinations and immunizations will be paid after July 1, 1967, for children in eligible families. Preventive services are not now paid and probably will not be paid if readily available through local health departments.

Beginning July 1, 1967, hospitals will be paid reasonable costs under a method as yet to be established by the Secretary of Health, Education and Welfare. So far as hospitalization of complicated antepartum and postpartum cases and delivery are concerned, such hospitalization costs must increase, and this is especially true in short stay hospital deliveries. Fees for physicians are already on the usual and customary basis and you are the best judges of potential increases in cost of obstetric care.

The sum and substance of this resume is that we must work together, with each of the partners accepting the appropriate share of the task. We must have individual and collective understanding and support to strengthen the health partnership for the people we serve in Illinois.

Alkaptonuria: Report of Six Cases

By Joseph R. Nora, M.D., GERALD E. Nora, M.D. and Michael Fitzgerald, M.D./Chicago

Alkaptonuria is a rare genetic disorder of amino acid metabolism which sometimes presents itself as a diagnostic problem in arthritis and diabetes mellitus. Characteristically, the urine in these patients is normal in appearance and becomes black on standing.

Although alkaptonuria is considered a rarity, in a period of a few months, the authors saw six such cases. Four of the patients were related and two showed unusual manifestations.

Report of Cases

Case 1. A 31-year-old white man was first admitted to Columbus Hospital on Jan. 12, 1960, with anorexia, nausea, abdominal pain, weight loss, and headaches of approximately two months' duration. There was a history suggestive of glomerulonephritis in childhood.

Clinical and laboratory findings are summarized in Table 1. Intervertebral disc calcification of the lower dorsal and lumbar spine (Fig. 1.) suggested the studies for alkaptonuria. The urine was examined for bile, urobilinogen, porphobilinogen, coproporphyrin, melanin, phenol derivatives and glucose (with glucose oxidase—Clinistick), all of which were negative. Benedict's test, sodium hydroxide test and ferric chloride test, as well as Fishberg's test were all positive for a reducing substance.

On March 22, 1960, the patient was readmitted, with recurrence of the previous complaints. During the period between admissions he had received various medications including bi-weekly injections of iron dextran for his anemia. At the time of his second admission, the patient appeared acutely and chronically ill, with extreme pallor. He received three units of blood in

From the Department of Medicine, Columbus Hospital, Chicago.

the next two days. After the last transfusion, he gradually developed a dusky blue discoloration of the entire body, which progressed over the next four days.



Fig. 1. Characteristic changes of the lumbar spine manifest by intervertebral disc calcification.

The patient was oliguric until March 29, when he became anuric. On this date he was seen for the first time and presented a striking picture. The skin of his entire body was the blue-gray color of a postman's uniform. There was evidence of pulmonary congestion and hepatomegaly, and a systolic mumur was heard over the entire precordium. The NPN and creatinine rose rapidly (see Table 2). The patient died the same day.

At autopsy, pigmentation of the skin was noted; the costal cartilages were almost black. Other significant findings included cardiomegaly (500 grams with left ventricular hypertrophy, about 150 cc. of brownish-black fluid seen in the pericardial sac; and

Table 1
Summary of Clinical and Laboratory Findings

Julillia	iry or cimi	icai ana L	aboratory.	2 111011153		
CASE	1	2	3	4	5	6
URINE COLOR			dark			dark
	amber	amber	urine	amber	amber	urine
REDUCED GLUCOSE	0	0	0	0	0	0
OXIDASE						
REDUCED BENEDICT'S	+	+	+	+	+	+
SOLUTION						
URINE HOMOGENTISIC		not				not
ACID	measured	measured	194 mg.%	158 mg.%	$176 \mathrm{mg.\%}$	measured
Qualitative Screening Test						
Normal-Negative						
FISHBERG'S TEST	+	+	+	+	+	+
TYPICAL ROENTGENO-	+	3	0	+	+	+
GRAPHIC						
CALCIFICATIONS						
ARTHRITIC CHANGES	+	0	0	+	+	+
FASTING BLOOD SUGAR	3	?	?	3	90 mg.%	84 mg.%
(Autoanalizer Method)						
Normal 60 to 100 mg.%						
SCLERAL	0	3	0	+	+	0
PIGMENTATION						
CARTILAGINOUS	+	?	0	0	+	0
PIGMENTATION						
FAMILIAL HISTORY	0	0	0	0	+	0
OF DIABETES						

Table 2
Laboratory Studies in Case No. 1

Date	Proteinuria	Dantain II Market NDM				
Date	riotemuna	Hematuria	NPN	Creatinine	Hgb.	
			mg.%	mg.%	gms.	
1-12-60	4+	Micro	76.5	6.25	5.9	
1-26-60	4+	Micro	137.5	6.8	_	
3-22-60	4+	Gross	130	12.0	3.5	
3-29-60	anuric	anuric	229	14.2	_	

hepatomegaly (2,800 grams). Both kidneys were slightly decreased in size. Microscopic examination showed large areas of fibrosis infiltrated by numerous lymphocytes and plasma cells. Other regions showed marked dilation of the proximal convoluted tubules, the epithelial cytoplasm had scattered deposits of a brown granular material. The tubules contained numerous casts, some of them hyalin, and some brownish and amorphous resembling hemoglobin casts. Others had a bright deeper brown color and were rounded or with a tendency to be elongated in shape. In one instance in the interstitial tissues round deposits of

crystal-like material surrounded by inflammatory cells were seen. Many glomeruli were hypercellular with thickening of the basal membranes. Capsular thickening with adhesions to the glomeruli were also found. Focal areas of fibrinoid degeneration were present in some of the glomeruli. The vessels had only moderate thickening of their walls. An iron stain had only a few positive areas in the lumen of the proximal tubules. None of the casts were positive for iron. Trichrome stains were not contributory. (Fig. 2.)

Case 2. A 40-year-old man was a brother of Case No. 1. Unfortunately, he was not

available for clinical examination. A urine specimen obtained, reduced Benedict's reagent but did not reduce glucose oxidase (Clinistick) and the Fishberg's test was positive. Addition of sodium hydroxide turned the urine a deep brown.



Fig. 2. Photomicrograph of the kidney showing a contrast area of atrophy and hyperplasia. The atrophic portion contains hyalinized glomeruli, numerous small tubules in the lumen filled by casts and increased interstitial fibrous tissue.

Case 3. A 34-year-old brother of Cases No. 1 and No. 2, had frequently passed dark urine and had had evidence of mental deficiency with multiple neurological defects. A urine specimen reduced Benedict's reagent (Clinitest), but the quantitative test with glucose oxidase (Clinistick) was negative and the Fishberg test was positive. The urinary homogentisic acid was 194 mg. per cent.² Roentgenograms of the spine showed no evidence of disease. The urine was tested for phenylalanine but was negative.

Case 4. A 43-year-old sister of Cases No. I, 2, and 3, had a history of low back pain and stiffness in both shoulders. The sclerae of both eyes showed brownish pigmentation at the muscular insertions near the epicanthus. The urine specimen reduced Bene-



Fig. 3. Marked intervertebral disc calcification most prominent between L1 and L2.

dict's reagent (Clinitest); did not reduce glucose oxidase (Clinistick); the Fishberg test was positive. Urinary homogentisic acid was 158 mg. per cent. Addition of sodium hydroxide turned the urine a deep brown. There was no roentgenographic evidence of arthritis in the shoulders, but early changes of ochronosis were noted in the thoracic and lumbar spine. (Fig. 3.)

Case 5. A 42-year-old white man was admitted to Columbus Hospital on April 24, 1960, with a history and symptoms of chronic and acute peptic ulcer. In 1942 he had an episode of "sciatica" and had a chronic backache ever since. In 1954, the patient suddenly experienced pain in the left heel while playing ball. He was admitted to the hospital for repair of a ruptured left Achilles tendon. In August 1955, a similar episode occurred while playing badminton and the patient was admitted to the hospital with rupture of his right Achilles tendon. On both occasions deep pigmentation of the tendon was noted. No microscopic examination-of the tendons was performed. Since operation the patient has restricted his activity and has had no further difficulty with the tendons.



Fig. 4. Characteristic calcifications of the intervertebral discs particularly between L3 and L4; and L4 and L5.

He had noted brownish discoloration on his underclothing for about ten years and in 1947 he was denied insurance because of "sugar in the urine." A glucose tolerance test performed at that time was normal.

Examination showed bluish discoloration of the ear cartilages. Pertinent clinical and laboratory data are given in Table 1. A roentgenogram of the lumbar spine is shown in Fig. 4.

Case 6. A 61-year-old white Brazilian woman was admitted to Columbus Hospital on April 19, 1961, with a history of cough and hemoptysis. A diagnosis of alveolar cell

carcinoma was made after bronchoscopy and Papanicolaou smear. Classic roentgenographic signs of ochronotic arthritis were seen in the lumbar spine. (Fig. 5.) She had passed dark urine on several occasions. Laboratory work showed a normal fasting blood sugar and glucose tolerance. Urine reduced Benedict's reagent (Clinitest), but did not reduce glucose oxidase (Clinistick). The Fishberg test was positive.



Fig. 5. Extensive intervertebral disc calcification of thoracic vertebrae.

Comment

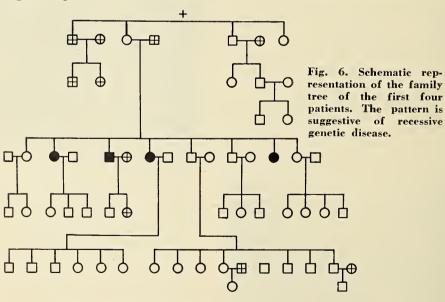
Manifestations of alkaptonuria are manifold but all appear to be related to the inborn error of metabolism.

From a genetic point of view there has

been considerable discussion as to the exact nature of the disorder. It occurs most commonly in males and it has been suggested that most cases are due to a recessive gene,³ with occasional evidence to suggest a Mendelian dominant.⁴

Milch⁵ has established that alkaptonuria is a result of a simple, rare autosomal recessive genetic defect. The data of the present report also suggest that the mode of transmission is recessive. (Fig. 6.) The possibility that a single gene might be responsible for the absence of homogentisic acid oxidase in the liver and kidneys was suggested by La Du.⁶ In later work⁷ he has shown that in alkaptonuric patients, there is absence of this enzyme in both kidneys and liver.

Most tests for diagnosis of alkaptonuria yield presumptive rather than conclusive results, for other products of excretion may give similar reactions. Freshly voided urine usually appears normal but becomes dark to black on standing for several days. If it is alkaline, however, or there are diminished reducing substances, it may become dark more quickly.⁸ This is nonspecific, as porphyrin, melanin, urobilinogen, phenol and indican, as well as gentisic acid will do the same. Silver nitrate will cause a precipitate⁹ and ferric chloride results in an eva-



- + Positive male and female
- O+□ Negative male and female
- ⊕ + ⊞ Male and female relatives not evaluated but believed negative by family history

nescent blue color. Fishberg's test, ¹⁰ in which a drop of alkalinized urine causes photosensitive paper to turn black is also very easily performed. Chemical testing for urinary homogentisic acid is another procedure. Paper chromatography and chemical isolation of homogentisic acid are specific but not useful as screening procedures. Recently, an enzymatic spectrophotometric method has been used in the diagnosis of this disease. ¹¹

A screening test to distinguish ochronosis from glycosuria is performed by boiling the urine with Benedict's reagent which gives a misleading reaction; both alkapton bodies and glucose in the urine will give a brown color when tested with Benedict's reagent but the former is darker and has a muddy appearance; and checking with glucose will give a negative reaction in alkaptonuria. These tests are both accepted and practical. The authors found, however, in the presence of homogentisic acid, that this could be further simplified by using Clinitest and Clinistick.

Our finding of ochronosis in the two cases in which we had tissue specimens agrees with the findings of other observers that the pigment is usually deposited in relatively avascular areas. ¹² On the basis of a report by Yasukazu, ¹³ the bilateral ruptures of the Achilles tendon in Case No. 5 may have been due to this deposit of pigment.

While definitive testing was done in only three of our cases, the clinical, roentgenographic and laboratory data strongly suggest the diagnosis of alkaptonuria, in all six individuals. In Case No. 1 there was some difficulty in explaining the intense slate gray color of the skin, which was present for several days before death, and is not characteristic of ochronosis. The previous therapy with parenteral iron may have had a direct relationship as the formalin-fixed skin had ten times the iron content (by the ash technic) of the control (see Table 3), although the tissue stains for iron were negative. The combination of large stores of parenteral iron, available chlorides and acidosis due to renal failure may have given rise to an in vivo ferric chloride test. The aural pigmentation in Case No. 5 is explained by deposition of the ochronotic pigment in the underlying cartilage.

In Case No. 1 the renal disease most

likely is coincidental. Some of the crystallike deposits surrounded by inflammatory cells, however, may have stimulated fibrosis and could have been a contributing factor to the underlying uremia and hypertension. As was previously noted, none of the casts in the renal tubules were positive for iron. The possibility that this might represent inspissated homogentisic acid complexes cannot be established at this time.

Table 3

Analysis of Formalin-Fixed Skin Control Patient

Weight 1.0687 g 0.4582 g

Total Iron .002 mg .010 mg

Comparative Iron on Equal Weight Basis .002 mg/g .022 mg/g

Summary

Six cases of alkaptonuria are reported. Unusual features were (a) acute slate gray pigmentation of the skin in an alkaptonuric patient dying in uremia and (b) rupture of both Achilles tendons in another patient, possibly secondary to pigment deposition.

The mode of inheritance of alkaptonuria in the four familial cases appeared to be a recessive trait.

Acknowledgement

The authors are indebted to Dr. Hyman Zimmerman for his constructive assistance and to Dr. Walter Zurndorfer and Dr. Vernon Phillips for patients No. 1 and No. 5.

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(Continued on page 746)

Long Term Chloramphenicol Treatment Without Bad Effect

By R. F. HERNDON, M.D./SPRINGFIELD

Large doses and prolonged use of chloramphenicol can produce anemia and related troubles. This is a case report of long and generous use of this substance without bad effect.

Case Report

This 31-year-old man was first seen by me on Sept. 30, 1960, with complaints of nausea of one month, itching of one month and jaundice of two days. He stated that he had had an episode similar to this diagnosed as jaundice two years earlier. Physical examination revealed a slightly enlarged liver that was tender and jaundice. Total bilirubin was 3.9 mg. per cent, 3.1 mg. per cent direct reacting. Cephalin cholesterol flocculation was negative. Thymol turbidity was 4.27 units. Heterophile 1:14. White blood count, hemoglobin and hematocrit were normal. An alkaline phosphatase was 12.58 Bodanski units. He weighed 260 pounds. Family history was positive for diabetes in his father. Hospitalization was refused. He was treated with vitamins and improved. Jaundice disappeared.

He was seen next on Jan. 31, 1961, with jaundice and itching of two days. He was admitted to the hospital and a tentative diagnosis of common duct stone was made. Jaundice gradually cleared but glucosuria appeared with four plus reducing substances in the urine. He was given a diet; urine sugar gradually diminished.

On June 25, 1961, he was again hospitalized because of recurrent jaundice. Exploration of the abdomen was undertaken. Multiple gall stones were found and in addition an adenocarcinoma of the Ampulla of Vater was discovered; a Whipple procedure was done. His postoperative course was uneventful and his weight fell to 200 pounds. Urine sugar disappeared without treatment. He was again well until Dec. 14, 1961, when

fever appeared. Fever ranged to as high as 105 degrees and at that point jaundice appeared. He was treated with chloramphenicol for the first of many occasions. Chloramphenicol was continued intermittently until January, 1962 when it was discontinued on Jan. 27, only to be restarted on May 14, 1962, because of chills, fever and itching. Chloramphenicol was taken in doses of about 500 mg. every six hours and in October, 1964, glucosuria reappeared. Chloramphenicol was continued at 1.5 to 2 grams a day until October, 1965. At that time with a respiratory infection and bronchitis he was switched to Ampicillin trihydrate 500 mg. four times a day. This has been continued subsequently. Occasionally attempts have been made to discontinue the Ampicillin and these have not been clinically successful. Recently a blood cholesterol was 179 mg. per cent, prothrombin time control 11.5 seconds, patient 13 seconds, activity 65 per cent, alkalin phosphatase 2.6 Bodanski units, serum bilirubin 0.12 mg. per cent direct, 0.38 mg. per cent indirect, total 0.5 mg. per cent. Serum oxalacetic acid transaminase 110 units, serum pyruvic acid transaminase 185 units. An electrocardiogram is abnormal showing a Right Bundle Branch Block. He currently weighs 286 pounds. X-rays of the stomach show a subtotal gastric resection without other abnormality. X-rays of the colon are normal. Total chloramphenicol intake came to 5,900 capsules, 1,975 grams over about 1,250 days. At no time was anemia, thrombocytopenia or leukopenia demonstrable.

Current management is essentially unchanged over earlier management except that Chloramphenicol is replaced by Ampicillin 2.0 gm. a day. In the absence of an antibiotic, chills, fever, itching and jaundice re-occur. The clinical diagnosis is cholangitis and common duct stricture following a Whipple operation.

Summary and Conclusions

A big (200-275 pound) young man with recurrent cholangitis took up to 2.0 gm. Chloramphenicol daily to a total dose almost 2 kilograms over about 1,250 days without bad effect. His size may have protected him by reducing the concentration of the drug per unit volume. Others have treated Cystic Fibrosis of the Pancreas^{1, 2} and Hodgkin's Disease patients with high doses without trouble. This supports the opinion⁴⁻⁷ that hypersensitivity plays a significant part in the bone marrow depression seen in patients receiving substantial doses of chloramphenicol.

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PRACTITIONER PRESCRIBES

Whereas the term "practice" indicates the dubious connotation of imperfection and a desire to improve, it has acquired in regard to medicine, over the years, a salutary, dignified and usually respected meaning. This "charismatic" aura should never be lost, regardless of the attitude of any snugly housed and gravely eager intellectuals, who removed from direct and sympathetic contact with the patient, preach without prac-

Fowler's Dictionary of Modern English Usage advises that spelling the word "practice" with the second 'c' be confined to the noun, "practise" being reserved for the verb, and cites "licence," to which the same usage applies. Since a practitioner in the United Kingdom must qualify as both physician and surgeon, what amounts to a legal mandate is given to the still respected term "general practitioner." The spelling ' 'practioner,'' not infrequently found in typescripts submitted for publication in the United States of America, is without authorization and not to be tolerated even as an abbreviation.

A final settlement of the niceties involved is the usages of practice, practise and practitioner leads to a still better appreciation of the symposium on "Favorite Prescriptions" mentioned in the opening paragraph of this discussion. For prescriptions and the prescribing of drugs and other remedial measures is traditionally a function, and an increasingly valuable one, of the practitioners of medicine, some 22 of whom have made their contributions to this number of the Practitioner.

Early in the present century, still considered by various standards as enlightened, a realistic appraisal of the formulary of the day resulted inevitably in a period of therapeutic nihilism. Nihil nisi bonum seemed to have become the motto. The pharmacologic discoveries of the last forty years have reversed the trend, however, until now the physician is faced with an embarrassment of new pharmaceutical riches (as well as a spate of iron pyrites) to add to a number of old remedies that are worth retaining; if they cure infrequently they often comfort. The New England Journal of Medicine, (Jan.) 1967.

Multicentric Squamous And Basal Cell Carcinoma Of Breast Simulating Paget's Disease

By Bernard Peison, M.D./Chicago

Primary malignant neoplasms arising from the epidermis of the breast are extremely rare. The literature on the subject is composed mostly of reports on isolated cases^{1, 2} and periodic analysis of accumulated data on these reports.

A female breast with a large ulcerated lesion over the nipple thought to be Paget's disease, was recently studied at the laboratory of surgical pathology at Mercy Hospital. Histological sections showed the lesion to be a multicentric squamous and basal cell carcinoma of the overlying skin with an underlying independent ductal mammary carcinoma.

Because of the rarity of such an association and the inability to find another comparable situation reported in the literature, the case is herewith reported.

Case Report:

The patient, an 80-year-old white woman, entered Mercy Hospital complaining of an eczematoid eruption and skin ulceration of her left breast. A psoriasiform type of skin eruption confined to the left breast had been present for the last 30 years. This was treated with ointments and ultraviolet light. Four months prior to admission she developed severe itching, scaling and ulceration along the lateral half of her left breast. This was associated with a purulent discharge from her nipple and several skin ulcers around the areola. Biopsy of the skin lesions revealed a basal cell epithelioma of low grade malignancy.

Physical examination showed a healthy appearing woman with normal vital signs. The blood pressure was 140/70 mm Hg, the pulse was 90 per minute and regular and the

Dr. Peison is Associate Pathologist and Associate Director of Laboratories at Mercy Hospital and Clinical Associate in Pathology at the University of Illinois College of Medicine, Chicago.

temperature was 99.6 F. The left breast was tender and inflammed with three ulcerated areas covered by a purulent exudate. The nipple was deformed, inflammed and ulcerated with a fibrinopurulent discharge. There was a firm nodular mass 3 by 3 cms. directly under the nipple.

Small lymph nodes were palpated in the left axillary region. The right breast was unremarkable. The remainder of the physical examination was normal. Three days after admission the patient had a left simple mastectomy. The pre-operative diagnosis was Paget's disease. Her post-operative course was uneventful and she was discharged improved 18 days after admission.

Pathologic Examination

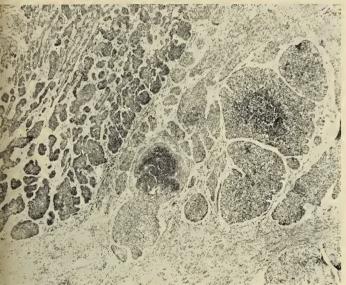
The surgical specimen consisted of a left simple mastectomy. The nipple in the overlying skin was markedly deformed and inflammed and was partially replaced by a 3 by 3 cm. purulent ulcer. Two similar ulcers



Fig. 1. Section of breast showing the mammary ductal carcino Note nests of tumor cells arising from the overlying skin. (H&E x :



ig. 2. Skin of breast showing independent foci of squamous and asal cell carcinoma arising from the surface epithelium. (H&E x 30)



ig. 4. Deeply invasive nests of tumor. Note the distinct pattern of quamous and basal tumor cells and the foci of necrosis. (H&E x 30)

were present in the skin of the left upper and lower breast quadrants. They measured 2.5 and 1.8 cm. Serial coronal sections through the breast revealed a rounded, firm, solid nodule measuring 3 by 2.5 cm. and located beneath the nipple. The cut surface was grayish-white and finely granular. The tumor appeared infiltrating into the adjacent breast tissue and was completely independent from the overlying skin. (Fig. 1).

Microscopic examination of the breast revealed two distinct and independent types of tumor. There were at least four independent tumor foci arising from the skin of the breast. The main growth of the tumor in



Fig. 3. Nests of squamous carcinoma arising from skin of breast. (H&E x 60)

the region of the nipple, showed the cells to be of squamous type with well defined partly calcified keratin pearls (Figs. 2, 3). The tumor was invasive and exhibited large areas of tissue necrosis (Fig. 4). Other sections of the breast showed the tumor to be multicentric. Some of the foci revealed the tumor to be of basal cell type (Fig. 5). In others there was a combination of basal and squamous cells (Fig. 6). The overlying skin was superficially ulcerated and infiltrated with a large number of acute inflammatory cells. There was an independent tumor which proved to be a primary ductal carcinoma underlying the nipple. The tumor cells were arranged in small glandular acini in a stroma of fibrous tissue (Fig. 7). Intermingled with the mammary tumor, were nests of metastatic squamous cells from the skin (Fig. 8). There was no evidence of a direct connection between the squamous tumor of the skin and the underlying mammary carcinoma.

Discussion

The breast arises from an epidermal thickening on the ventral surface of the body at approximately the sixth week of fetal development. The adult female breast is a modified alveolar secretory gland derived from the skin. It is composed of approximately 20 irregular lobes radiating from the central part of the nipple. Each lobe has an excretory duct exhibiting beneath the nipple a local dilatation known as the sinus lactiferous. Large ducts at the nipple are lined by stratified squamous

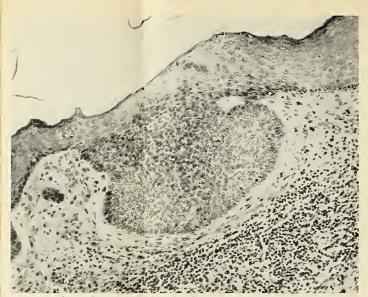


Fig. 5. Independent foci of basal cell carcinoma. (H&E x 150)



Fig. 6. Another independent foci of basal cell carcinoma. Note the squamous dedifferentiation of the tumor cells. (H&E x 60)

epithelium which gradually merges with the columnar cells of the smaller subdivisions.

Malignant neoplasms arising from the skin of the breast are extremely rare. Only three reports were found after review of the literature. Congdon and Dockerty¹ found two cases of squamous cell carcinoma of the nipple in approximately 10,000 cases of malignant disease of breast, in which operation had been done at the Mayo Clinic since 1910. Willis and Goldie² reported a case of an intraepidermal carcinoma of the nipple and skin of a male breast, and stated that the case was unique in the literature. The exact reason why epidermoid and basal cell carcinomas of the skin in the female

breast are rare is not known. Haagensen³ suggested perhaps because this area gets little ultraviolet light. He mentions only two cases of basal cell epitheliomas in the files of surgical pathology at Columbia Presbyterian Hospital in New York. In the present case, there were multiple independent foci of tumor in the skin of the breast. The tumor in some areas was of squamous cell type, while in others it was of basal or mixed cell type. Several authors have described basal cell epitheliomas with features of squamous cell carcinoma. According to Montgomery,4 15 to 20 per cent of all basal cell carcinomas are either mixed or of the intermediary type. The mixed type is described as showing partial horn-pearl formation with a parakeratotic rather than a horny center. The intermediary type is described showing two kinds of cells: those with a small elongated deeply basophilic nuclei regarded as basal cells, and those with large round pale staining nuclei, regarded as intermediary in character between basal and squamous cells. Wilson⁵ in a series of more than 1,265 cases of epitheliomas studied histologically, reported an incidence of 10.8 per cent of basal-squamous cell tumors. The existence of basal-squamous cell tumors is however not generally accepted. Lever⁶ believes that the mixed type of basal-squamous cell epithelioma represents a keratotic basal cell epithelioma, and the intermediary type a solid basal cell epithelioma with differentiation toward sebaceous or apocrine glands. Lever⁶ does accept the existence of a "mixed carcinoma" where the squamous carcinoma is contiguous to a basal cell epithelioma.

The author is reluctant to engage in speculation on the biological significance that the treatment for the skin eruption may have had in producing the multiple skin neoplasms. I cannot exclude the alternative of a primary skin predisposition for neoplasia—the so-called "benign multicentric superficial basal cell carcinoma."7 Inquiry into the histogensis of basal cell carcinoma reveals an apparent paradox in the activities of the epidermal cells. It appears that a tumor derived supposedly from the more primitive epidermal basal cell, is biologically less malignant than a tumor derived from the maturer germinative cell, the prickle cell. Various authors have tried to explain the difference by showing that the two types of carcinoma are not derived from

the same type of cell. Many authors consider basal cell carcinoma to be derived from adnexal epithelium either in its adult or embryonic form, while squamous cell carcinoma derives from the epidermis proper. The presence in this case of an intimate admixture of both cell types may suggest the multipotential basal layer as the cell of origin, with further dedifferentiation of the tumor growth at a later stage of development.

The coexistence of a primary mammary carcinoma and carcinoma of the skin of the breast, may suggest that one is dealing essentially with a case of Paget's disease of the nipple. The diagnosis of Paget's disease is based primarily on the identification of Pagets cells, which were first described by Darier in 1889. These are large pale round or polyhedral cells, present singly or in small or large clumps in the affected epidermis without a tendency to invade the dermis. There are two conflicting views regarding the histogenesis of Paget's disease. One that it arises as a primary carcinoma of the epithelium of the main ducts in the nipple, and that the surface lesion results from intraepidermal spread of the carcinoma cells8. The other that it is a primary epidermal change, carcinomatous or pre-carcinomatous and that the neoplastic change in the duct epithelium is coincidental9. This latter view is supported by the occasional finding of an intraepidermal carcinoma affecting the nipple and areola, in which the main ducts are entirely free from tumor but in which there is an intraductal carcinoma in the deeper ducts. The inference is

ig. 7. Mammary carcinoma with nests of squamous tumor cells. $H\&E \times 60$)

that intraepidermal spread cannot take place under these circumstances, although it has been postulated that a tiny undisclosed focus of intraductal carcinoma at the apex of the terminal galactofores, may give origin to Paget cells in such instances. The occurence of such cases are, however, rare. It is more frequent to find the intraepidermal changes and the intraductal carcinoma in actual continuity. Willis¹⁰, from the study of 16 of his own cases of Paget's disease and of the records of others, concludes that transitions between epidermal and Paget cells are to be seen, and that Bowen's and Paget's diseases are not distinct entities but related variants of the entity intraepidermal carcinoma. Inglis⁸ on the contrary could discover no transitions between epidermal and Paget cells. He concludes that both diseases are fundamentally different, in that Bowen's disease is due to changes in the epidermal cells in situ, Paget's disease to intraepidermal spread of cancer of duct origin. It is now generally accepted that Paget's disease of the nipple is a cancer from the beginning and that the initial lesion is a carcinoma in situ, arising in one or more mammary ducts near their outlets. The cytoplasm of Paget cells contain PAS positive, diastase resistant material which is a strong argument in favor of their glandular rather than epidermal origin¹¹. The surrounding squamous cells may also give a slightly positive PAS reaction, which however disappears after diastase digestion¹². In the present case, the skin carcinoma at no times showed Paget cells. The tumor on the contrary was seen arising from the surface squamous epithelium and

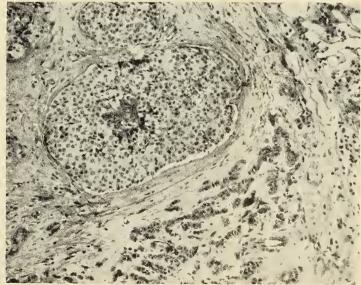


Fig. 8. Nests of squamous carcinoma within mammary cancer. (H&E x 150)

infiltrating deeply into the underlying tissue.

The mammary carcinoma was composed of glandular acini infiltrating diffusely into the adjacent breast issue and permeating the perineural lymphatics. Cells similar to those arising from the tumor of the skin, were present within the mammary tumor. Since there was no direct continuity between both tumors, the possibility of metastases is to be considered.

Summary

A case is documented of the association

of a mammary ductal carcinoma with a multicentric squamous and basal cell carcinoma in the overlying skin. Nests of squamous tumor cells were present within the mammary carcinoma. The lesion resembled clinically Paget's disease of the nipple and to the best of my knowledge, no previous such association has been reported in the literature.

Acknowledgement: I wish to express my thanks to Dr. G. W. Changus and Dr. M. Swerdlow for their valuable suggestions and criticism and to Dr. W. Thompson for the time in going over the manuscript.

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President's Page

(Continued from page 630)

the story of organized medicine on radio and television.

For years the press and public have been fed a diet of anti-physician, anti-AMA propaganda that has distorted the traditional image of the doctor into a moneygrubbing, inhumane machine. We've found that the press and public are eager to have a chance to evaluate what they hear from us against what they have been told about our motives.

I recommend that all of us-individually and as members of medical organizations-respect the power of a positive public relations program. We are grateful to Jim, to Mary Schroder, Gary Kennon, Gaylen Lair, and Gail Tipton for arranging this effective program. We admire their talents and have come to realize how necessary our co-operation is for them to accomplish anything on our behalf. I ask that each and every member of this society provide that co-operation when called upon by our professional public relations staff.

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THE NEW MAJORITY

As Abraham Lincoln said to the Workingman's Association of New York: "Let not him who is houseless pull down the house of another, but let him work diligently and build one for himself, thus by example assuring that his own shall be safe from violence when built. I take it that it is best for all to leave each man free to acquire property as fast as he can. Some will get wealthy. I don't believe in a law to prevent a man from getting rich; it would do more harm than good." Ward L. Quaal, The Rainbow of Delta Tau Delta for Summer, 1967.

The average age of the 5.8 million veterans of the Korean Conflict is 38, according to the Veterans Administration.

* * * *

While more and more employers are hiring the handicapped in spite of their disabilities, some hire workers because of their handicaps. For instance, a chemical firm in Florida employs the blind to judge taste and odor of synthetic flavoring and perfume chemicals, finds them four times more effective than sighted workers.

Human Chorionic Gonadotropin (HCG) in Treatment Of Obesity

By James H. Hutton, M.D., and Angelo P. Creticos, M.D./Chicago

While the idea of using HCG in the treatment of obesity originated with Simeons¹, he has written little about it. Unfortunately it became more widely known through the columns of the lay press, which dubbed it the "Roman Slimming Method"—this apparently because Simeons lives in Rome and HCG, used as he suggests, enables the body to lose fat where the patient wishes it to come off. The idea that HCG might have some such effect is mentioned by Rony² in a single paragraph.

Engelbach about 1920 said that some types of obestity were due to hypopituitarism and that injections of anterior and posterior pituitary extract twice weekly would be followed by a redistribution and then a loss of weight. We have confirmed that in hundreds of cases. After 48 years of use, with no adverse effects ever reported, the Food and Drug Administration ruled that Anterior Pituitary Extract could be used only as an experimental drug. This put it beyond the reach of the private practitioner. HCG is the nearest approach we have to such a product.

Simeons' program for weight reduction consists of:

Injections of HCG Diet restriction Psychotherapy.

Diet and psychotherapy are important in any reducing program. Simeons' diet is more restrictive than others. In the barest outline his program is about as follows:

Careful Medical Evaluation

First the patient is given a careful medical evaluation to make certain that other problems, if any, may be properly appraised. Patients are allowed to eat freely for a few days. They are then given injections of HCG, 125 units daily, (six days a week) until 40 injections have been given. After the

third injection they are put on a 500 calorie diet, which allows 200 grams of certain meats, fish or fowl, some fruit and vegetables, mostly of the 3 per cent variety. It is as free as may be of fat. He asks patients not to come in contact with fat if it can be avoided. After the 40th injection patients continue on the diet for three more days.

They are then allowed a more liberal diet, particularly more protein. They are to weigh daily. Any day the scales show a 2-pound gain they are to skip a meal that day. After 6 weeks, during which time they are not to lose any more weight, a second series may be started. If a third series is needed, it is not started until eight weeks after the termination of the second. He expects patients to lose from one-half to one and one-half pounds daily, but permits no more than a 35 pound loss during any sixweek period. If patients do not lose steadily, or if for four days they show no loss and insist they have been on the diet, he allows an "apple day." In 24 hours patients may eat six apples. They need not eat all of them but they may not have more. During this 24 hour period fluids are restricted to barely sufficient to quench thirst. On any day the patient fails to lose, Simeons goes into a conference with the patient to find out if possible, at that time, what happened. Many times patients inadvertently stray off the diet.

Safeguards Surround Program

Simeons surrounds this program with safeguards. He realizes that 200 grams of meat, fish or fowl a day would hardly keep an adult in nitrogen balance. He says that the injections of HCG do this, for the six weeks. As soon as the injections are stopped he increases the patient's protein intake. He will not institute this program in the presence of an acute infection or a severe injury. Patients who have had a coron-

ary thrombosis must wait until the electrocardiogram has been stable for a least three months before starting treatment. He points out that patients with small gall stones may experience an attack of colic during the treatment and they should either be prepared for that or have the gall bladder removed before starting treatment. Those with a high serum uric acid may experience an acute attack of gout during the treatment. He uses a small amount of HCG, about 5000 units in 6 weeks;—our text books suggest the use of 5000 units two or three times weekly in the treatment of some gonadal disorders in youngsters.

Simeons recognizes the importance of psychotherapy. Dr. Bisogni, a psychiatrist, is with him during the treatment. He says in his book "Pounds and Inches" (p. 93): "Each case must be handled individually and the physician must have time to answer questions, allay fears and remove misunderstandings. He must also check the patient daily. When something goes wrong he must at once investigate until he finds the reason for any gain that may have occurred. In most cases it is useless to hand the patient a diet sheet and let the nurse give him 'a shot.'"

Siegel³, who has had a wide experience, says that psychotherapy is responsible for 50 per cent of the good results. We are uncertain of the percentage but are very sure that psychotherapy plays a role in this, as it must in any reducing program.

Criticized in Medical Literature

This program has been criticized in medical literature and on radio and TV. Sohar4 says he "assumed from the start that the success of Simeons' regime was in no way related to gonadotropins." Craig, Ray et al⁵ report unfavorably on it. Hastrup el al⁶ report it as ineffective. None of these authors followed Simeons' regime. What they did had little resemblance to what he does; so their criticisms are hardly valid. Capt. Barry W. Frank, Medical Corps, U.S. Army, in the March 1964 issue of the American Journal of Clinical Nutrition, "The Use of Chorionic Gonadotropin in the Treatment of Obesity," reports unfavorably on it. But Simeons could have told Dr. Frank in advance that the plan he proposed to follow would result in failure. Other critics have been almost vehement in denouncing it. Recently a well-known gynecologist insisted that five injections of 250 units each given

in a period of 10 days was responsible for cervical polyps seen 10 days later. Lebon⁷ and Carne⁸, who followed Simeons' plan more closely, report favorable results.

We have been using this regime since 1959 in those patients that seemed fitted for it. We have to vary it to suit local conditions. We give 250 units three times a week and a slightly larger amount of protein in the diet but continue the treatment until the patient loses the desired amount of weight unless there is some indication to interrupt it. The patient may tire of it. Vacations, business trips, etc., may interfere. Naturally, multi-vitamins are given daily, preferably a formula containing calcium. Simeons says these injections affect the teeth somewhat as pregnancy does and so these precautions should be taken.

Results of HCG Injections

Injections of HCG appear to do a number of things:

- 1. They enable the patient to live on a diet, with very little hunger, that would otherwise be intolerable.
 - 2. Patients experience a sense of euphoria.
- 3. They enable the body to lose fat where the patient wishes it to come off. Simeons calls these abnormal fat deposits.
- 4. Patients lose the many aches and pains to which obese patients are subject. Those with mild arthritic symptoms are likely to feel better during the treatment, but will relapse to their former status when the injections are stopped.
- 5. Middle aged women usually acquire a more youthful appearance.
- 6. Many women with brittle finger nails will grow ones of better quality during treatment. The nails relapse to their former status after treatments are discontinued.

Our experience has been with several hundred cases. We are gratified with the results and so are the patients. We shall continue to use this regime in those cases that seem suited to it. However, our cases are not documented in a way that would be regarded as "scientific evidence" in many quarters.

The obesity problem is one of the most important ones facing medicine today. Our treatment of it is far from satisfactory. Even the Simeons regime does not correct the underlying anomaly that leads the patient to put on weight. However, even some of the critics⁵ admit that patients who have lost

weight on this regime regain it more slowly than those who lose weight on other programs. Jean Mayer says that 16 per cent of people under age 30 are overweight and Williams⁹ says that 50 per cent of people male and female-over age 40 are overweight. It seems to us that almost any program that promises relief is worthy of careful investigation and trial. Because of the part played by psychotherapy it is not likely that double blind studies where the physician sees the patient only occasionally will determine the place of this regime in American medicine. It is much more likely to be determined by men in private practice where the patient's welfare is the prime considera-

Simeons had wide clinical and public health experience before limiting his practice to this field. He is a well trained British physician. One seriously considering the use of this regime in his own practice would do well to read Simeons' book "Pounds and Inches." There are statements in it with which many of us in the endocrine world disagree, but it gives fuller descriptions of the details of the regime than is possible in the columns of a medical journal.

Undoubtedly Simeons has made a great contribution to the comfort, convenience and welfare of many fat people.

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5 Percent of Children are Orphans

Despite the recent relatively low death rates among adults of childrearing ages, orphanhood remains a problem of considerable magnitude in the United States, according to statisticians of Metropolitan Life Insurance Company. Estimates by the Social Security Administration indicate there were 3,400,000 orphans under 18 years of age in January, 1966. This represents nearly 5 percent of our total child population.

The burden of orphanhood usually is borne by women, who generally outlive their husbands. Of all orphans today, about 71 percent have lost their fathers only. About 26.5 percent have lost their mothers only. In addition, about 80,000 children, or less than 2.5 percent of all orphans,

have lost both parents.

In 1964 about 845,000 families were broken by the death of a husband or wife, orphaning over 420,000 children under age 18. Although the current chances of death at the early adult ages are relatively small, some 119,000 children lost fathers who were under 45 years of age. It also is significant that more than 93,000 children under 18 survived fathers who died at ages 45-54, while 70,000 were orphaned by the death of older fathers.

The number of children under 18 orphaned by the death of a mother was only half those who lost a father. In 1964 there were 141,000 children who lost mothers and about half of these, or 69,000, were left in the care of fathers under age 45.

Metropolitan's statisticians point out that the greater risk of the premature death of the father reflects the fact that mortality is higher among husbands than among wives at every age, and the husband is usually a few years older than his mate.

The chances are 46 in 1,000 that a child born to a father 25 years of age will be a paternal orphan before reaching 18. The chances are more than twice as great—101 in 1,000—when the father is 35 at the birth of the child. Moreover, almost one in four children born to fathers 45 years of age will be a paternal orphan.

Supracondylar Fracture Of The Humerus In Children

By Richard L. Jacobs, M.D. / Chicago

Supracondylar fracture of the humerus is a common injury of children. Unlike most other childhood fractures, the incidence of complications can be appreciable even in experienced hands. This is illustrated by reviewing 1,200 cases reported by various authors.

Averages are taken from series in which a given complication was recorded. There was a change of carrying angle of the elbow in 29 per cent of the cases. Some 7 per cent had various neurologic complications; 4 per cent had some degree of vascular complication, though considerably less than 1 per cent developed Volkman's contracture; 30 per cent had some loss of either flexion or extension of the elbow. Avascular necrosis of the trochlea was not widely recognized clinically (and secondary osteoarthritic changes are probably often incorrectly attributed to the primary trauma); there was an 8 per cent incidence in McDonnell's series. Data from included series is summarized in Table I.

This, then, can be a formidable fracture, but given early and appropriate care the incidence of complications can be reduced. This paper will discuss care of the average fracture, and treatment of impending complications.

Physical Examination

The initial examination must be complete, and findings should be recorded along with the time of the observation: changes may be apparent on later examination which will alter the mode of treatment.

In addition to the usual notes concerning external deformity and swelling, there should be detailed observations concerning the circulatory status of the extremity. If the brachial, radial, and ulnar pulses are palpable this should be recorded, and in their absence the color of the extremity and state of capillary refill even more closely commented on.

A thorough neurologic exam is also important. Changes will occur with impending Volkman's contracture (discussed later). Equally important is the early detection of neurologic deficit due to nerve injury anywhere proximal to the fracture, and caused by the same violence as the fracture. This must not mistakenly be attributed to ischemic contracture, and motor or sensory deficit above elbow level should be viewed with this suspicion at any time. Pain and limitation of motion may well make a complete neurologic examination difficult, but with close attention to both sensory and motor distribution of a given nerve, gross deficit may be adequately detected.

Following splinting of the arm, anteroposterior and lateral films of both elbows should be ordered. The films of the normal elbow will help in assessing the injury as well as the adequacy of the reduction later.

Reduction of the Fracture and Evaluation of Position

The method of reduction of the fracture will largely depend on the findings at time of physical examination. If the radial and ulnar pulses are intact and there is no neurologic deficit, closed reduction is done under general anesthesia. Ninety-six per cent of the cases are of the extension type,4 with the distal humeral fragment displaced posteriorly (Fig. 1). The usual methods of reduction of the extension type fracture have been well described.^{2,3,4,7} Longitudinal traction on the supinated hand with axillary countertraction is used to disengage the fragments and to release any interposed soft tissue structures before correcting the posterior displacement. Hyperextension completes the disengagement and malrota-

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	Total Cases	Flexion	Type Extension	Vascular Complications	Neuro. Complications (U = ulnar, M = median, R = radial)	Volkman's	Varus Measurable Carrying	Angle Change Valgus	Decrease Flexion	Decrease Extension	Increase Extension	Tardy Ulnar Palsy	Avascular Necrosis Trochlea
Fahey (1960)	231	3	228		2 - U								
Fraser (1958)	308			5	2 - U 12 - M 7 - R 2 - M 2 - R 11 - R	0							
F1ase1 (1998)	300			9	2 - M	v							
Hoyer (1952)	52				2 - R		22	3	12	9			
					7 - M								
Lipscomb (1955)	108			11	2 - U	0							
Madsen (1955)	30						4 8 8						
Mann (1963)	85						8	6		2	6		
McDonnell (1948)	53						8	3				l	4
					3 - M								
0.1. (1050)	000				2 - R 1 - U	1							
Salter (1959)	200				1 - 0	1	23	2					
Smith (1960) Wilson (1938)	50 83	8	75				43	,					
	3000	8	75										
Total Cases	1200												



Figure I—An extension-type supracondylar fracture of the humerus.

tion is then corrected by varying the degree of supination simultaneously with medial-lateral molding at the elbow. Direct forward pressure over the tip of the olecranon then forces the distal fragment forward. The elbow is flexed to maintain the reduction. The radial pulse should be checked during flexion; if the pulse disappears with the elbow flexed beyond a right angle, the patient is not a candidate for ambulatory treatment; usually reduction cannot be maintained unless the elbow is flexed beyond a right angle. In this position, the elbow flexors are relaxed and tension of the triceps helps maintain reduction.

Even with satisfactory x-ray films, it can be difficult to decide whether adequate reduction has been achieved; there is a 29 per cent rate of malunion in this type of fracture. The complication here is change in the carrying angle of the elbow, which can be both unsightly and a functional impairment. If the elbow is extended to be certain the carrying angle has been restored, the reduction may be lost. Various authors have attributed changes in carrying angle to poor correction of rotation, to medial or lateral displacement of the distal fragment, or to epiphyseal plate injury with subsequent deformity with growth. Current thought is that deformity is mainly due to lack of correction of medial angulation (with cubitus varus the resultant deformity) or of lack of correction of lateral angulation (with increased cubitus valgus the deformity) of the distal fragment^{3, 15} (Fig. 2). Medial or lateral displacement of the distal fragment of

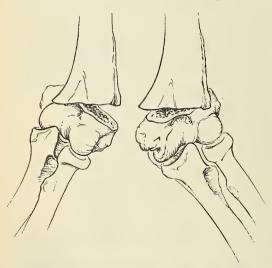


Figure II—Medial angulation causes varus deformity. Lateral angulation causes valgus deformity.

the humerus should have merely a translational effect, and not change carrying angle. Keeping in mind that the distal end of the humerus is flattened in anteroposterior diameter, rotation is probably of chief importance in that it allows sufficient loss of contact of the fragments for medial or lateral angulation to occur^{13,16} (Fig. 3). A



Figure III-Flattened anteroposterior diameter of the distal humerus; small contact area with rotation of the distal fragment predisposes to angulation. typical case with marked residual rotational deformity by x-ray, but little angulation deformity, has a 5° carrying angle on the injured right side, as compared with 8° on the uninjured left side (Fig. 4). Angulation of the distal fragment of the humerus, then, is the one deformity which must definitely not be allowed to remain. After reduction, angulation may be reasonably estimated without extending the forearm.¹⁶ Looking at the patient from behind, with his elbows flexed 90°, mark the tip of the olecranon process and both medial and lateral epicondyles bilaterally. The triangles thus marked should correspond and both should have the same degree of angulation of the apex with regard to the midline. Medial deviation of the apex (tip of the olecranon) indicates varus deformity with decreased carrying angle or gunstock deformity. Lateral deviation of the apex indicates residual valgus deformity with increased carrying angle (Fig. 5).

Should this simple test show unacceptable angulation, further molding, and possibly



Figure IV—Marked rotational deformity in a healed supracondylar fracture. No appreciable change in carrying angle.



Figure V—A Satisfactory reduction may be determined without extending the elbow.

repetition of the entire reduction will be required. The problem then is to maintain the proper angulation after the extremity is immobilized in plaster. Salter¹⁵ claims to almost have eliminated changes in carrying angle by a "twist of the wrist." If x-rays of the distal fragment before reduction show medial angulation and displacement (impending varus deformity), he immobilizes the forearm in full pronation, thus putting a rotatory stress on the distal fragment of the humerus which tends to correct the angulation. (Fig. 6). Conversely, if the distal fragment initially shows lateral angula-

tion and displacement (impending valgus deformity) the forearm is immobilized in full supination (Fig. 7). In the usual case, deformity is the result of inadequate reduction, and the diagnosis of epiphyseal injury with growth distrubance should not be evoked!

Anatomic reduction may not be attainable. Even so, extensive remodeling with functionally good results may be seen. Attenborough1 has reported four such cases. In Mann's¹³ series of 23 cases with severe displacement initially, and less than anatomic reduction subsequently, he found that posterior displacement of the distal fragment leads to no permanent deformity or disability and molds with growth. Posterior angulation up to 10° is not significant later. The effect of rotation is as already stated and doesn't deform unless medial or lateral tilt then occurs. Varus or valgus tilt of the distal fragment are deforming in the amount of their angulation and do not correct with growth.

Immobilization In Plaster

If the circulatory status remains adequate after reduction, immobilization in the usual

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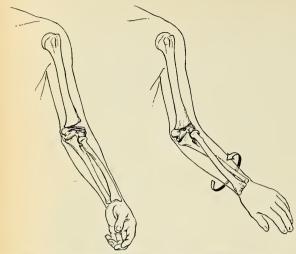


Figure VI—Medial angulation with impending varus deformity; after reduction, immobilization with the forearm in pronation.

fracture may be with a posterior plaster splint from axilla to metacarpophalengeal joints, supported by a sling. The circulatory status of the extremity often improves remarkably after closed manipulation¹¹ and reduction. A well-reduced fracture with no impending complications should require no analgesic or sedation other than aspirin.² Continuing pain of greater degree than this requires careful re-evaluation of the patient, as does gradual increase in pain.

In any event, even after a simple, uncomplicated fracture is reduced, overnight hospitalization with frequent observation for onset of vascular complications is advisable.

Indications For Treatment In Traction

If there is marked displacement or instability of the fracture, appreciable swelling, or evidence of nerve or vascular injury, treat-

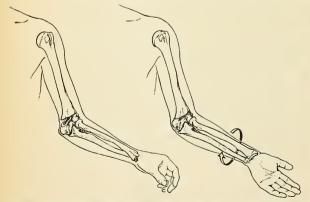


Figure VII—Lateral angulation with impending valgus deformity; after reduction, immobilization with the forearm in supination.

ment by traction should be elected in the first instance. Various acceptable methods have been described, using skin traction and/or olecranon skeletal traction.^{2, 6, 8, 16} Dunlop's traction, or a modification thereof (Fig. 8) is usually convenient. If there is excessive swelling or skin injury an olecranon pin is preferred. Pin traction also has the added advantage of giving better control of the fracture fragments.

During the period of observation, close watch is maintained for incipient Volkman's ischemic contracture.

Circulatory Complications And Treatment

Here, clinical judgment dictates whether treatment in traction with close observation can be continued. Overtreatment is preferable to the disaster of a Volkman's contracture. Traction may be continued even in the absence of the radial pulse if there is quick capillary refill in the hand, no appreciable pain, no motor or sensory deficit, and if the fingers can be completely passively extended with ease. (Difficulty of extension of the fingers indicates a dangerous increase in pressure within the fascial compartments of the forearm.)



Figure VIII—Circumstances may indicate use of traction primarily.

Caution should be exercised in close reliance on the value of capillary refill as a major indicator of circulatory status. If a rubber band is wrapped tightly enough around the base of one of your own fingers, circulation will be completely occluded. With this closed vascular bed, refill will still occur easily though cyanosis soon is apparent. Capillary refill is not a totally adequate means of evaluation!

Should the five P's of an impending Volkman's contracture (pain, pallor, paresthesia, paralysis, pulselessness) fail to resolve after the extremity is placed in traction and the fracture reduced, further treatment must soon follow. This is no time to "wait until morning!"

As an initial step, it may be found that all that is needed is a stellate ganglion block to help relieve arterial spasm. The technique is not difficult, and is well described in standard texts. Should this fail to improve the situation, exploration of the injured extremity should be done at the earliest possible time. Recovery of function has been reported in some cases which have gone as long as eighteen hours⁵ before exploration of the antecubital fossa, but it should be remembered that this is the exception rather than the rule! Surgery is conservative treatment in this situation.

At the time of surgical exploration, all fascial compartments are opened to insure adequate decompression. The finding of a torn brachial artery dictates segmental excision to release spasm of the collaterals, as does thrombosis or local spasm of the brachial artery which does not respond to local stripping and infiltration with procaine.11

Of the eight cases explored by Lipscomb,11 two had actual rupture of the artery, two had thrombosis of the artery, two had local spasm, one had bone impingement, and one a bone fragment had impaled the artery. None of these eight cases ended with the sequelae of Volkman's contracture.

In cases which have no vascular complications threatening, open reduction of supracondylar fractures of the humerus may well lead to marked permanent decrease of elbow motion, and has had very rare application in this country. Closed reduction with internal fixation by blind pinning has also been described but has not found wide favor.17

In most cases if early reduction is obtained, a sling and splint may be used for immobilization as already described. If traction is used, it is usually possible to complete the reduction (if necessary) and commence with splint and sling after ten to fourteen days. Check films should be taken at three days and ten days after injury; loss of reduction can be corrected early.

Immobilization should be continued until the fracture is clinically solid, and in the average case this takes about four to five weeks. When immobilization is discontinued, there will be marked limitation of motion of the elbow. At no time should there be resort to passive stretching to regain range of motion; this may well lead to permanent contracture. The child will regain range of motion with active use of the extremity and physical therapy is not indicated.

Summary

Treatment of supracondylar fractures of the humerus in children is a true emergency procedure because of the ever-present threat of Volkman's ischemic contracture.

A simple means of determining adequacy of reduction is discussed, as are methods of ambulatory and of traction treatment. The most common complication, malunion with change in carrying angle, can be avoided by proper immobilization and care after adequate reduction.

Circulatory difficulty persisting after reduction and failure to respond to stellate ganglion block is a definite indication for prompt surgical exploration of the antecubital fossa.

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Arhinencephaly & Its Clinical Significance

By Benjamin Emanuel, M.D., Renato R. Katubig, M.D., and Lucito G. Gamboa, M.D. / Chicago

Arhinencephaly, a rare congenital anomaly seen in the newborn period, refers to congenital anomalies characterized by the absence of the olfactory bulbs and atrophy of some of the rhinencephalon. The classification of the various types of arhinencephaly have been reviewed recently,^{1,2} but the importance of such anomalies should be familiar to the pediatrician and ear, nose and throat specialist, since both will be confronted with the problem at birth.

Case Report

Hospital Course: A newborn female delivered at Edgewater Hospital was noted to have several congenital anomalies of the face at birth. The infant was delivered per vagina, 40 weeks gestational age, weighing 2400 grams at birth, to a primipara whose prenatal medications consisted only of vitamins. There was marked microcephaly, head circumference of 28 cm. with obliteration of the anterior fontanel, mongoloid facie, absence of the nose, cleft lip, cleft soft and hard palates with absence of the philtrum (Fig. 1). Pupils were equal and the ears normal. Chest was clear and heart was reported as irregular but no murmur was heard. Palpation of abdomen revealed no abnormalities. There was generalized hypotonia and more could not be demonstrated.

At birth the infant was cyanotic but without retraction; color improved when infant was placed in the isolette. Four and a half hours after birth the infant had generalized convulsions which lasted from two to three minutes. Similar convulsive episodes were to characterize the next five days, each time phenobarbital proving effective in controlling the seizures. At 24 hours the infant was started on oral feedings and had cyanotic

spells on two occasions. At five days there was sudden rise in temperature to 106°F. and the infant died within five hours. Autopsy showed, besides the above mentioned facial anomalies, striking abnormalities of the brain.

Autopsy Findings: There was marked hypoplasia of the frontal lobes although the posterior portions of the cerebrum and the brain stem appeared to be essentially normal. The olfactory bulbs and tracts were



Fig. 1. Facial appearance of infant.

absent. There was no corpus callosum so that there was only one ventricular cavity instead of the usual two lateral ventricles. The basal ganglia did not show any gross abnormalities. Microscopic examination of the brain showed the most severe changes in the frontal lobes. The nerve cell bodies in these areas were very sparse and the usual cortical lamination was no longer seen. There was a dense appearance to the tissue

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because of a marked hyperplasia and hypertrophy of the glial cells. The heart and great vessels showed partial transposition with pulmonary atresia (pseudo-truncus). There was also an atrial septal defect of the fossa ovalis type measuring 5 mm. in diameter. In addition, there was ventricular septal defect situated in the anterior septum and was confluent with the aorta. Lungs revealed massive bronchopneumonia.

Discussion

Multiple forms of arhinencephaly have been described in the literature. These include ethmocephaly, cebocephaly, arhinencephaly with median or lateral cleft lip, arhinencephaly with trigonocephaly or microcephaly, and arhinencephaly with absence of the corpus callosum.^{3,4,5} By far the most common is arhinencephaly with median cleft lip.3,4,6 The factors or causes for the occurrence of arhinencephaly and cleft lip are unknown are present. Genetic, environmental anoxia, virus infection and steriod intake by the mother were incriminated as possible causes of cleft lip and palate malformations. The ingestion of the plant verathrum californicum was recently found to cause cyclopian malformation in lambs.7 The association of arhinencephaly with 13-15 trisomy was reported and reaffirmed recently.8

A cleft lip was thought to result from the failure of fusion of the paired lateral maxillary processes with the median frontal process.9,10 Stark believes that there are no processes in the central third of the face and that the lip and premaxilla exist in their early form as an epithelial wall in which masses of mesoderm are normally present.9 Failure of mesodermal penetration of the epithelial anlage of the upper lip is proposed as the mechanism involved in the formation of the cleft. In arhinencephaly the philtrum, the area of the upper lip below the septum of the nose, is absent and, therefore, a wide cleft of the lip is confluent with a single nasal opening.

In cases where extensive bilateral cleft lips are present, the philtrum is present, thus revealing the difference between arhinencephaly and extensive bilateral cleft lips. Besides the absence of the philtrum hypotelorism is another important finding with arhinencephaly as shown by Currarino and Silverman.⁴ These observers by studying the skull films of normal infants and

children and two patients with hypotelorism, arhinencephaly, and trigonocephaly, constructed a scattergram. Orbital hypotelorism indicates an abnormal narrowing of the inter-orbital distance. It is the result of primary hypoplasia of the ethmoid bone which occupies the inter-orbital space or is secondary to a mere basic cause. The only instance of hypotelorism observed in this study was that occurring in association with arhinencephaly and trigonocephaly.

If the patient with hypotelorism shows no visible defect and the hypotelorism is con-



Fig. 2. Brain showing absence of corpus callosum.

firmed radiolographically, he probably has trigonocephaly and has a good prognosis. However, if the patient has hypotelorism and accompanied by defects of the nose, palate or lip, one is probably dealing with arhinencephaly and the outlook is poor and the patient seldom survives beyond a few months. Death is caused by associated anomalies. The associated anomalies are always cerebral: The olfactory nerves and bulbs are absent, the forebrain is undivided and corpus callosum and septum pellucidum are missing. The nasal cavity is unseparated, the horizontal plate of the ethmoid bone, crista galli, philtrum and premaxilla are missing. Besides this, congenital heart disease is severe and incompatible with life.

Our case seems to be typical and resembles the other few cases previously reported, with all these associated anomalies and death ensued less than 48 hours after ear, nose and throat consultation was requested. Unfortunately, no chromosomal studies were performed in our case.

Summary

The clinical course and postmorten findings in an infant with arhinencephaly are presented. A median cleft lip and absence of the philtrum associated with hypotelor-

ism were presented in our case. The case is typical and prognosis is always poor due to associated cerebral and cardiac anomalies.

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A RUNNING COMMENTARY BY PERIPATETIC CORRESPONDENTS

Henry Sigerist, whose Autobiographical Writings, has now appeared in an English edition, to the end of his life, never ceased to find inspiration from the sight of a blank page of his specially bound exercise books. His fountain-pen flowed, and the number of pages he set himself to write each day were covered with his characteristic widely spaced sprawling words. The lesson seems to be not to wait on inspiration. In this way one can perhaps ensure quantity. But quality? There lies the rub. Sigerist had no difficulty. To describe him as the "universal man" of the Renaissance is almost a cliché. For him there was no dichotomy between art and science. Indeed, if you wanted to sum up his lifework in a sentence, he placed medical history squarely in the framework of history as a whole. But history as a whole meant for him the everyday life of slaves, peasants, craftsmen, and labourers as well as the life of doctors, men of science, painters, musicians, architects, scholars, princes, and politicians. So that when he spoke about William Harvey his account of the contemporary scene seemed to make it inevitable that Harvey had to discover just at that time how the circulation worked. You might say that, like his fellowcountryman, the art historian Burckhardt, he contrived to make historical harmony out of seemingly unrelated and discordant historical figures and events. The Lancet (June 17) 1967.

Neonatal Streptococcal Meningitis

By K. RAMANATHAN, M. B., B. S. and A. Grossman, M.D. / Chicago

Bacterial Meningitis is seen more often during the first month of life than at any other time¹. This is a formidable problem because diagnosis at this age is difficult, therapy is uncertain and the prognosis is poor.

In 1943 Gibel et al² reviewed the literature on Streptococcal Meningitis in infants under three months of age and collected 56 cases with only two recoveries. He reported a third patient that recovered. Since that review scattered reports of Streptococcal Meningitis have appeared in the literature with four recoveries in 30 cases. This high mortality rate, approximately 87 per cent despite the use of modern chemotherapeutic agents is alarming and deserves further intensive study since it is a potentially curable disease.

The difficulty stems from the fact that the subtle clinical manifestations of meningitis in the neonatal period makes the diagnosis difficult. In the fully developed form its recognition is relatively simple. In the absence of meningeal signs early diagnosis is difficult even to an experienced pediatrician. The purpose of this report is to add two illustrative cases and to emphasize the need for early detection and treatment and to speculate on the measures to reduce the high mortality rate.

Case Reports

No. 1. Four weeks-old white female was hospitalized for fever, anorexia and irritability of six days duration. Mother was gravida 3 para 3. The infant was the product of an uncomplicated full term pregnancy and delivery. She started to have a spiking tem-

Dr. Ramanathan is Chief Resident, Department of Pediatrics, Mt. Sinai Hospital and Instructor, Department of Pediatrics, Chicago Medical School. Dr. Grossman is Chairman of the Department of Pediatrics, Mt. Sinai Hospital and Professor of Pediatrics, Chicago Medical School. perature which ranged up to 104° F. six days prior to admission. She had been very irritable and refused to feed. A few hours before admission mother noticed twitchings of the left upper eye lid. On admission the infant was afebrile and irritable. The fontanelle was not bulging and there were no Kernig's or Brudzinsky's signs. Heart and lungs were normal. The spinal puncture was performed and the cerebrospinal fluid was cloudy and contained 2225 WBC per cmm; 93 per cent of which were segmented polymorphonuclear cells. Smear revealed Gram positive cocci in pairs. Bacteriological studies revealed the causative organism to be Group A beta hemolytic streptococci. The patient was treated with intravenous fluids and aqueous penicillin two million units every two hours. Patient continued to have twitchings of left upper eye lid which in a few hours progressed to generalized seizures which did not respond and she expired 30 hours after admission.

No. 2. An eight-day-old male infant was admitted with fever, lethargy and generalized seizures for two days. Mother gravida 2 and para 1. The pregnancy and delivery were reported to be uneventful. Mother stated that two days after returning from hospital the infant did not feed well and felt warm to the touch. She had a generalized seizure and was brought to the hospital. On admission the infant appeared listless. Temp.: 102° F. The neck was stiff and fontanelle were not bulging. A spinal puncture was performed and the fluid was turbid containing 5750 WBC per cmm. Mostly polymorphs. Cerebrospinal fluid sugar was 5 mg. per 100 cc. Smear of the spinal fluid showed Gram positive cocci in pairs. Bacteriological culture revealed Group A beta hemolytic streptococci. Therapy consisted of intravenous fluids and aqueous penicillin two million units every two hours. She continued

Table I. Mortality in Streptococcal Meningitis

	KAGAN et al (3)	BEVERIDGE (4)	DEBRE et al (5)	WATSON (6)	DUPONT et al (7)	GROOVER et al (8)	MENNIK et al (9)	ZIAI et al (10)	TOTAL
Total number of cases with neonatal meningitis	12	11	46	45	11	39	1	83	248
Streptococcal	1	1	4	6	3	5	1	9	30
Streptococcal Recovered	0	0	not known	3	0	not known	I	0	4

to have generalized seizures in spite of the therapy and she expired nine hours after admission to hospital.

Discussion

A decade and a half ago Alexander¹¹ in her review on bacterial meningitis expressed an optimism that cure from all forms of meningitis was possible with the use of chemotherapeutic agents. But such an optimism was never realized and even today the mortality rate is reduced only by a little and in most survivors permanent sequelae result. Few of the most important factors that contribute to such a high mortality and morbidity rates are delay in diagnosis, easy susceptibility of the neonate and maternal complications like prolonged labour, premature rupture of membranes and maternal infections.

The clinical picture of meningitis in the neonate is very ambiguous. Few of the most common symptoms of neonatal meningitis such as fever, vomiting and seizures are nonspecific. The diagnosis of meningitis can only be confirmed by a lumbar puncture. Early diagnosis depends upon a high index of suspicion coupled with the liberal use of lumbar puncture needle.

What makes the neonate easily susceptible to meningitis is largely unknown. Some of the factors that are mentioned are abnormal phagocytic power of their leucocytes¹², al-

tered humoral antibody levels and increased permeability of blood brain barrier¹³. Only further research in this area will delineate the reason for increased susceptibility.

Ziai and Haggerty¹⁰ found that 62.5 per cent of the mothers of infants with neonatal meningitis had obstetrical complications. There is no doubt that proper obstetrical management will reduce the mortality significantly.

Maternal infection is one of the most common predisposing factors in neonatal meningitis. Ziai and Haggerty¹⁰ found maternal infections in 12 per cent of their cases of neonatal meningitis. Berman and his coworkers14 found maternal infections in 57 per cent of the cases of neonatal meningitis. These data point out that mother is an important source of infection to the newborn. In fact a few authors have isolated the organism causing meningitis from the mother. Keitel et al15 reported two cases of neonatal streptococcal meningitis where the offending organism was also cultured from the maternal cervical secretions. Berman et al14 showed that the offending organism was the same as that isolated from the mother in five cases.

It is obvious that maternal infections have to be treated to reduce the incidence of neonatal meningitis. Evidence of intrauterine infections can be obtained from the smear of the fetal surface of the placenta, smear and culture of the fetal gastric fluid16 and histological examinations of the frozen sections of the umbilical cord¹⁷. Bacteria found in the amniotic fluid, cord blood or in the fetal organs are often the same as those found in the vagina7. A search for and eradication of organisms from the cervicovaginal tract during the pregnancy may constitute a valid prophylaxis against neonatal meningitis. This together with a high degree of suspicion in infants not looking like they should in the neonatal period will make for early diagnosis and thus increase their chances for recovery.

Summary

Two cases of Streptococcal Meningitis

ending in death of full term neonates have been presented. Since 1949, 30 cases of Group A Beta Streptococcal Neonatal Meningitis have been reported with only four recoveries. The importance of suspecting Meningitis in an infant who is not doing well without an adequate explanation is stressed, especially if there is a history of obstetrical complication.

Diagnosis can only be made by examination of cerebro spinal fluid. Treatment should be prompt and vigorous based on careful and complete bacteriological data. Prognosis is still poor, but there is hope with the early institution of appropriate therapy.

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Blue Shield

(Continued from page 675)

in Medicaid programs "to minimize the establishment of new government systems and inefficient outflows of government spending."

During the questioning, Senator Carl Curtis (R-Neb.) asked why Blue Shield was limiting its proposal for the purchase of health care coverage in government programs to Title XVIII.

He recalled that he had made a similar proposal to purchase health care for the aged at the time Medicare was being considered.

Under Senator Curtis' proposal, one-third of the aged who are in the upper income category would purchase their own health care protection. One-third of the aged in the lower income level would have all of

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their health insurance coverage purchased by the government, while those aged in the middle category would have 50 per cent of their health care protection purchased by the government.

Dr. Layton responded that this also was Blue Shield's position before the Senate Finance Committee in its testimony on Medicare.

Curtis said he was "intriged" by Blue Shield's proposal and declared that greater savings could be realized if his proposal had been accepted by Congress.

As for the Medicare program, Dr. Layton said the needs for the aged to show a receipted bill in filing direct pay claims "is causing considerable dissatisfaction and some hardship to beneficiaries."

He applauded the efforts made in H.R. 12080 to rectify this problem, but suggested a simpler solution.

Sacrococcygeal (Presacral) Teratomas Occurring In Adult Siblings

By Robert J. Maganini, M.D./Chicago

Presacral or sacrococcygeal teratomas are indeed rare and the occurrence of almost identical tumors in two adult sisters is thought to be a significant reportable observation. Only one other case report involving siblings has come to the attention of this writer¹³.

At the Mayo Clinic, an incidence of one case of sacrococcygeal (presacral) teratoma in 10,000 female admissions has been noted and at the Lahey Clinic 11 presacral dermoids in adults were seen in the years 1929 to 1957. It is generally accepted that the incidence of sacrococcygeal teratoma is approximately one in every 35,000 to 45,000 live births. Other lesions must be considered in the diffierential diagnosis of this disease and they are also rather rare. These include chordoma, myelomeningocele, ependymoma, retrorectal abcess, low pilonidal cysts and sinuses, neurogenic tumors and various mesenchymal tumor types. Presacral teratomas are frequently asymptomatic although in many cases the patients complain of a wide variety of disturbances such as backache, dyspareunia, disturbances of micturition, constipation, sciatica, sterility and the presence of a sacrococcygeal or gluteal mass. Patients with these tumors may also have associated congenital defects such as spina bifida, hemivertebrae, imperforate anus and congenital anal stenosis. 13, 14, 18

Case Reports:

Case 1. Mrs. A. G., age 31, para III gravida III. This young woman was seen in a physician's office in December, 1965, at which time a rectal examination revealed the presence of a retrorectal mass which had been asymptomatic, as well as a pronounced postanal (dimpling) skin defect. On Jan. 2, 1966, the patient was admitted to the hospi-

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tal where a proctoscopic examination was performed which revealed a bulging, cystic, nontender retrorectal tumor covered by smooth rectal mucosa. A barium enema examination was also performed, as well as x-rays of the sacrum and coccyx. These showed no pathologic changes with the exception that the rectal ampulla was displaced in an anterior direction by the tumor. On Jan. 4 the patient was taken to surgery. Here a spinal anesthetic was administered and aspiration of the mass through an anoscope was attempted. About 0.5 cc of a grayish-tan putty like material was obtained which had no odor. The patient was then placed in a prone jackknife position and a transverse incision was made between the tip of the coccyx and the anal sphincter. By blunt and sharp dissection, a large lobulated tumor mass was removed. The tumor was quite closely associated with the posterior rectal wall and it was also noted to be in close continuity with the posterior anal dimple which this patient had had since birth. After examining the specimen the pathologist reported a "benign teratoma". (Figs. 1 and 2). The space created by the removal of the tumor was packed with iodoform gauze and drained. Healing was without incident.

Case 2. Mrs. L. C., age 25, para II gravida II, full sister of the above patient, who was seen in the office in April, 1966. She related that a rectal mass had been discovered 10 months beforehand when she was examined on a routine prenatal visit. Since she was aware of her sister's tumor surgery, she presented herself for examination. The patient had no symptoms referable to the rectal mass. Examination revealed the presence of a smooth retrorectal tumor somewhat cystic to palpation, and a less pronounced, but definite, post-anal skin (dimpling) defect. She was admitted to the hospital on May 4, 1966, and the following day, under general anesthetic and in a prone jackknife position,



Figure 1. Microphotograph (40X) of tissue section, Case #1, showing a cystic cavity lined with respiratory epithelium and showing an infiltrate of mononuclear cells.

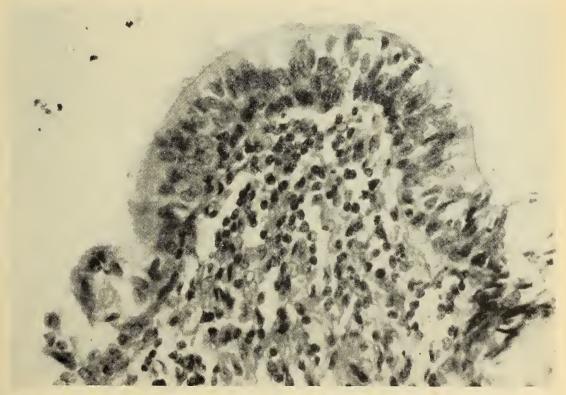


Figure 2. Microphotograph (450X) showing higher power view of above with ciliated columnar epithelium.

a transverse incision was used. The coccyx was resected and a lobular mass was completely excised. This tumor was also noted to be quite intimately attached to the posterior rectal wall and again, was closely associated with the small posterior anal dimple. This tumor proved also to be a "benign teratoma" and the histologic picture was very similar to that of her sibling. (Figs. 3 and 4.) The wound was packed with iodoform gauze and Penrose drains were put in place. Subsequent healing was without incident.

No problems of sepsis or healing were encountered in either of these cases. Both were placed on Sitz baths and Sulfasuxidine 2.0 gm q.i.d. postoperatively. The Penrose drains were gradually advanced and completely removed in about 12 days. Both wounds were completely healed within five weeks of the dates of surgery.

The above two case histories are typical of many adult patients with this disease and in addition are interesting because they highlight a genetic causation for these tumors. Approximately 69 per cent of adults

with sacrococcygeal teratomas are in the 20 to 40-year age group and 76 per cent of these adults are females². The sacrococcygeal

teratomas of infancy and childhood appear to be closely related to those found in adults. The tumors found in adulthood, in all likelihood, have their inception at the time of birth or before.2, 8, 12 The fact that 77 per cent of all cases in adults are presacral or retrorectal in location (and therefore occult) is probably one of the reasons that this group of patients escapes detection until adulthood.2 Another reason may be that this patient group represents a slower growing type of teratoma, and this is borne out by comparing the incidence of malignancies in reported series of adult and infantile sacrococcygeal teratomas. The incidence of malignancy in infants is uniformly higher, ranging as high as 64 per cent, while malignancy in adults is quite rare.2, 5, 8, 9, 11

In both of our cases a congenital post-anal dimpling defect was noted and proved to be closely associated with the caudal aspect of the tumor mass.

Killen and Jackson² found a congenital abnormality of the perianal region in 54 per cent of their series of cases and presacral tumors have also been reported in association with other anomalies of the lower enteric tract such as congenital anal stenosis and imperforate anus.18 Since sacrococcygeal



Figure 3. Microphotograph (40X) of Case #2 showing a cystic cavity lined by squamous epithelium with underlying sheets of neural tissue.



Figure 4. Photograph of gross specimen removed in Case #2 showing the variegated appearance of the tissue.

teratomas occur predominently in two age categories, first of all in infants and secondly in women in the childbearing age group, they are of special importance to obstetricians and gynecologists as well as pediatricians. Women with these tumors may have difficult deliveries due to obstruction of the birth canal when the tumor is of sufficient size3, 12 and sometimes cesarean section is necessary.12 Also, infants with large sacro-

coccygeal teratomas may encounter difficulty passing through the birth canal.9, 15, 19, 20, 21 A syndrome of preeclampsia, prematurity, dystocia and hydramnios in mothers carrying fetuses with sacrococcygeal teratomas has also been well documented. 12, 15, 19, 20, 21 Typically, these infants with large sacrococcygeal teratomas become arrested in the birth canal during the second stage of labor with the head, thorax and upper extremities delivered. However, inability of the operator to deliver the pelvis, the tumor and lower extremities invariably results in fetal death.

Summary

Almost identical sacrococcygeal teratomas (presacral) were found in sibling sisters. Both tumors were asymptomatic and discovered incidentally. Both were associated with post-anal cutaneous defects. Sacrococcygeal teratomas are known to be associated with a high incidence of twinning^{2, 10} and the implication of these case reports is that genetic determinants are paramount in this disease. The obstetrician is probably the key man in the detection of these tumors and should be alerted by the presence of a nontender retrorectal mass that may be associated with an anal abnormality. Also, obstetricians should be alerted in the prenatal period by the presence of hydramnios and preeclampsia to the possibility of the fetus having a sacrococcygeal tumor. The possibility of making a prenatal diagnosis of fetal sacrococcygeal teratoma is desirable and possible utilizing the radiologic criteria set forth by Sarma and Nemiraja.24

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(Continued on page 713)



THE VIEW BOX-



Fig. 1



Fig. 2

By Leon Love, M.D.

Director, Department of Diagnostic Radiology, Cook County Hospital,
and Clinical Professor of Radiology, Chicago Medical School

THE VIEW BOX

This 56-year-old white male entered with complaints of recurrent bouts of flank pain and a recent episode of pain and hematuria.

Physical examination was unremarkable. The patient was normatensive. Urine analysis revealed 15-20 red blood cells and 1+ albumen.

What's your diagnosis?

- 1) Necrotizing papillitis of the kidney
- 2) Tuberculosis of the kidneys
- 3) Medullary sponge kidney
- 4) Nephrocalcinosis

(Answer on page 734)

Sacrococcygeal Teratomas

(Continued from page 711)

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In its 165 hospitals, six independent outpatient clinics and three outpatient clinics where no VA hospital is located, the Veterans Administration employs 16,000 registered nurses plus 26,000 nursing assistants, including more than 3,500 licensed practical nurses.

A.A. Publishes "Comic Book"

A striking depature in pamphlets on alcoholism has been made by Alcoholics Anonymous with publication of a pocket-size "comic book" for adults, according to Dr. John L. Norris, nonalcoholic chairman of the General Service Board of A.A.

Titled "What Happened to Joe . . . and his drinking problem," the 14-page leaflet tells in bright four-color drawings the story of a young construction worker with a wife and two children. "The new pamphlet," Dr. Norris said, "is directed both at people who by preference read very little and at people who find reading difficult. With its pictorial approach, we hope to bring accurate information about A.A. to many alcoholics who have not been reached through previously used media."

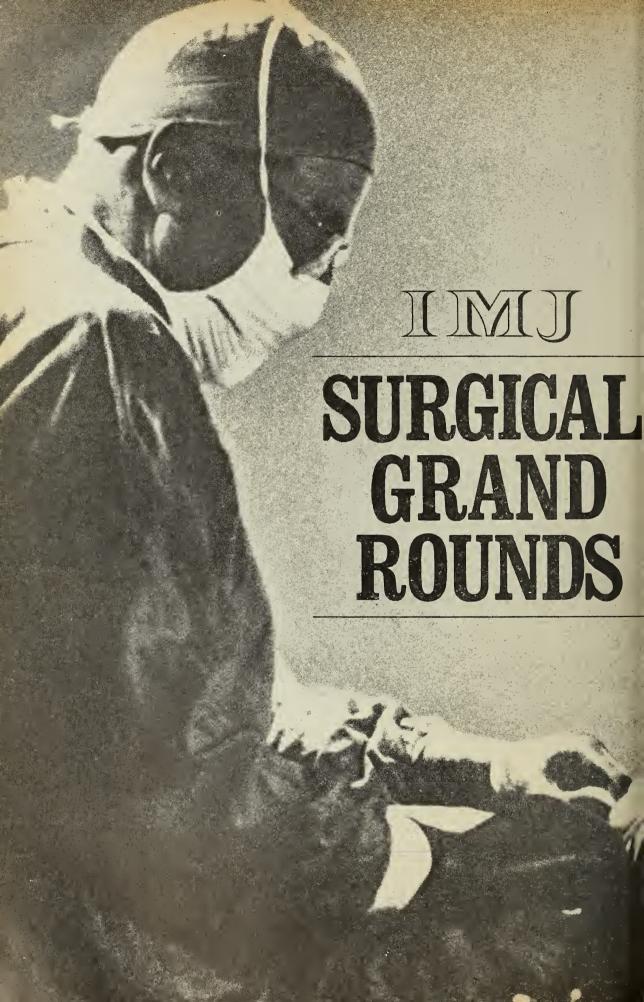
"What Happened to Joe" traces the development of alcoholism in the life of one man, showing the early, usually undetected symptoms of the disease and their effects on family life and job performance. Later pages of the booklet relate what happens to Joe after he is introduced to A.A.'s fellowship of recovered alcoholics. His own recovery is marked not only by sobriety, but by his recognition of alcoholism as a disease and by his willingness to help a friend similarly afflicted.

"A.A. does not pretend to any medical expertise in the etiology or symptomatology of alcoholism," Dr. Norris pointed out. Therefore, the pamphlet does not touch on possible unconscious psychological causes of alcoholism, nor does it offer a precise diagnostic guide. It does, however, provide for the problem drinker himself a brief questionnaire of drinking, with the suggestion that anyone giving several "Yes" answers will find in A.A. others who responded in the same way.

Eight pages in the pamphlet picture what alcoholics do at typical A.A. meetings.

In keeping with A.A.'s policy of not campaigning for members, "What Happened to Joe" will not be freely distributed by A.A., but will go only to individuals and organizations asking for it. The A.A. General Service Office is willing to make quantity sales to other agencies, Dr. Norris said.

The 14.8 million veterans of World War II now average 48 years of age, the Veterans Administration reports.



Case Presentation:

Villonodular Synovitis

EDITED BY JOHN BEAL, M.D.

Northwestern University Medical Center

Surgical Grand Rounds are held weekly at 8 a.m.; alternating between the staff room, Chicago Wesley Memorial Hospital and Offield Auditorium, Passavant Memorial Hospital. Patient presentations from these hospitals and from the Veterans Administration Research Hospital form the basis of the discussions. This case report was part of Surgical Grand Rounds held at Passavant Memorial Hospital on April 8, 1967.

Dr. Marvin Mitchell: A 59-year-old white female was well until 10 months ago when she fell and sustained a twisting injury to her right knee. A diagnosis of "a pulled ligament" was made elsewhere, and she was treated with heat and analgesics and improved. During the succeeding 10 months she experienced four exacerbations of pain and swelling about the right knee with or without minimal specific trauma. Each episode was treated with heat and improved. There was mild discomfort between these episodes. However, she complained of occasional buckling of the knee and wore a knee brace. One week before admission to Passavant Memorial Hospital she experienced another exacerbation of pain and swelling, which was localized over the medial side of the knee. At the time of admission, significant findings were limited to the right lower extremity. She was able to flex the knee 100° only, and she lacked 10° of full extension. The knee was stable and thigh atrophy was not present. She was tender over the medial joint line and an effusion was present. There was a systic mass measuring approximately 3 x 3 cm. in the popliteal space. Blood count and urinalysis were normal. A diagnosis of a possible tear of the medial meniscus was considered and x-rays of the knees were obtained.

Dr. Hirsch Handmaker: The lateral projection radiograph of the right knee demonstrates supracondylar bone erosion just above the patella. There is evidence of joint effusion with a soft tissue density behind the joint. The findings of bone erosion, a non-calcific mass density and a joint effusion in a typical location are characteristic of villonodular synovitis (Fig. 1).



Fig. 1. Radiograph of the right knee in lateral projection demonstrating suprapatellar fluid filling the bony impression in the supracondylar anterior femoral shaft. Popliteal fluid density of cystic nature also indicated.

Dr. Mitchell: The knee joint was aspirated and 55 cc. of a dark, thick, chocolate-like material was obtained. The most likely diagnosis was now pigmented villon-odular synovitis. The patient was taken to the operating room and, through a median para-patellar incision, the knee joint was

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exposed. The knee joint was filled with a brown chocolate-like material. The synovium was stained by this material and was hypertrophic. The patella was completely devoid of cartilage in one large area and elsewhere the articular cartilage was severly degenerated. The lateral femoral condyles were covered with degenerated cartilage and there were large osteophites growing about its borders. The menisci did appear intact but the supporting ligaments were being invaded by this synovium. As much of the synovium was excised as possible. In addition a patellectomy and meniscectomy were performed. The hypertrophic bone was removed. Through a second incision, the cyst of the popliteal space was exposed, and found to be filled with similar material and communicated with the knee joint. Postoperatively she has been receiving irradiation.

Dr. Joseph Sherrick: A section through the thickened synovium (Fig. 2), demonstrates a thick layer of connective tissue with fibrosis and mononuclear cells containing brown pigment. This is the most striking feature of the lesion. In addition, there are spaces which may represent areas where lipid-containing materials, probably cholesterol crystals, were deposited. Villi in this particular case are not as predominent as they are in some that I have seen but the presence of the mononuclear phagocytes with the granules of hemosiderin is considered to be characteristic of pigmented villonodular synovitis.

Dr. James Stack: Dr. Sherrick, do you consider this to be a neoplasm or an inflammatory disease?

Dr. Sherrick: I think that it is an inflammatory disease. The cause is not known. It is not simply due to repeated hemarthroses because patients with hemophilia simply get blood staining without this villous proliferation. It is more like a reaction to injury than to a true tumor, although on occasion histiocytes and fibroblasts may be so proliferative that there is a resemblance to tumor histologically.

Dr. Stack: The prognosis as far as the joint involved is concerned is not good. The side effects would be, at best, an incomplete

(Continued on page 720)



Fig. 2. Photomicrograph of thickened synovia with lymphoid aggregates and hemosiderin—containing histiocytes (arrow). The pigment does not show up well in the photograph. (x 120)



PRINCIPLES OF HEAD AND NECK SURGERY. By H. Robert Freund. Appleton-Century Croft. A Division of Meredith Publishing, N.Y. \$12.50.

This book provides in a single volume the basic knowledge and essentials of operative technique for the various problems of head and neck surgery. There are six contributing authors of diverse disciplines; dentistry, anesthesiology, otolaryngology, and general surgery. The illustrations are by Gottfried W. Goldenberg and are excellent. There are 322 pages of text and a generous bibliography at the end of each chapter. The references cited include contributions made in 1966.

There are nine chapters exclusive of the introductory chapter. Two are of a general nature and the remainder concentrate on specific areas of head and neck surgery. A full chapter is devoted to the techniques of diagnosis in head and neck cancer, with emphasis on the advantages of aspiration needle biopsy and cytology. The method of needle biopsy is presented with instructions for its performance in an efficient, safe and accurate manner. The success of these techniques is equally dependent upon the interest of the surgeon and the cooperation of the pathologist.

The second general chapter discusses the behavior of head and neck tumors. Predisposing factors, patterns of metastases, conventional radiation therapy, preoperative radiation therapy, and indications for radical neck dissection are included. The discussion on preoperative radiation, while brief, summarizes well the available clinical material. Low dose irradiation followed rather promptly by definitive surgery would seem to represent a promising approach for improving recurrence rates and survival times in patients with head and neck

cancer. The question of elective radical neck dissection is resolved with the recommendation that "routine neck dissection should be performed for most squamous cells carcinomas with a known high metastatic rate regardless of the presence or absence of palpable lymph nodes." This is contrary to the opinion of Martin and Frazell, who advocate radical neck dissection when 1) the nodes are palpable or 2) when the neck is entered in the resection of the primary cancer. The author points out that this controversy will probably not be resolved until a large controlled series is obtained. In the discussion of simultaneous bilateral neck dissection, the statement is made that this procedure has a "much higher operative mortality rate" than a staged procedure. When bilateral simultaneous neck dissection is indicated the cancer is advanced and staging of the surgery impractical. One would expect a greater mortality and morbidity for major surgery on more advanced cancer. The cure rate obtained by simultaneous bilateral neck dissection makes the procedure worth the effort.

Included in the chapter entitled "Behavior of Head and Neck Tumors" is a section on the role of hypotensive anesthesia in head and neck surgery, which has been demonstrated by Eckenhoff and Melan to reduce blood loss by 70 per cent. The experience at Northwestern University has resulted in enthusiasm for this technique when it is applicable and supports the author's interest and observations.

The remaining chapters are concerned with the specific surgical treatment of head and neck cancers in various locations. The discussion of the particular neoplasms is well informed and the recommended surgical procedures beautifully illustrated. The

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author presents both sides of controversial topics. In his discussion of the proper treatment of papillary cancer of the thyroid, the relative advantages of total thyroidectomy versus total lobectomy for cancer confined to one lobe of the thyroid were clearly outlined. The question of an elective neck dissection in such cases was also thoroughly reviewed with a presentation of the better statistics available and a minimum of arbitrary editorializing.

I believe the authors have succeeded in their original goal of assembling the basic principles of head and neck surgery in one book. The book has an extensive bibliography. It is recommended for residents and clinical surgeons who do head and neck surgery.

Paul H. O'Brien, M.D.

RADIOLOGY IN WORLD WAR II. Edited by Kenneth A.D. Allen, M.D. U.S. Government Printing Office, Washington, D.C. (Superintendent of Documents) \$8.25.

The material in this book and the background for it were supplied entirely by the medical officers who served in World War II and had firsthand knowledge of the total radiologic experience. It was edited by Dr. Kenneth D.A. Allen and was written by 31 contributors.

The volume describes in detail the development of the routine diagnostic use of X-ray under field conditions in disease, in combat, and in noncombat trauma. This exciting book also relates the advances in radiation therapy, including the splendid work with supervoltage therapy developed at Walter Reed General Hospital and so profitably expanded since.

The contents include brief historical notes on all phases of radiology up to World War II; chapters on personnel, equipment, radiation therapy, and induction centers; the story, in separate sections, of radiology in the Zone of Interior, the major overseas theaters of operation, and the minor commands. Once given the basic equipment without which they could not function, radiologists and their technicians operated it and kept it operational, often under almost incredible difficulties of climate, rainfall, snow, humidity, sandstorms, flora and fauna, and tropical disease. They frequently, in the face of need, converted basic equipment to uses for which it had not been designed. They improvised essential accessory equipment. They devised methods of protection when formal techniques were impossible. Not the least of the near miracles that radiologists performed was the conversion into practical radiologists of medical officers with little or no formal training in this field and the creation of competent radiologic technicians from recently inducted soldiers who, for the most part, had never before seen an X-ray machine or been in an X-ray darkroom.

The last chapter unfolds the radiologic story of the Manhattan Project, the top-secret of World War II project which developed the atomic bomb. As a result of the system of medical precautions, this project, fraught with great and unknown hazards, was carried to a triumphant conclusion without a single radiation injury.

This 1132-page volume has 37 chapters with 317 illustrations, eight charts, 14 maps, and a comprehensive index.

T. R. Van Dellen, M.D. Editor

Essays On History Of Nutrition And Dietetics. Compiled by Adelia M. Beeuwkes, E. Neige Todhunter, and Emma Seifrit Weigley. The American Dietetic Association, Chicago, 1967. \$8.00.

The essays are a unique collection of various topics related to the history of nutrition and dietetics. The papers were selected from those which appeared in The Journal of The American Dietetic Association over the past 36 years. The volume was prepared as a tribute to the founders of the Association, in celebration of its fiftieth anniversary. And, to provide immediate and easy access to the historical aspects of nutrition. The Committee responsible for this compilation suggests that the book be placed on the coffee table or bedside shelf "to dip into and find pleasant and informative reading." And this it does.

The book is divided into four major topics, all dealing with history. The first concerns nutrition and dietetics, the second, food and cookbooks, the third, hospital diets and therapy, and the last, biographical studies.

The section on old cookbooks, for example, is my favorite and will be of interest to physicians and their wives. It is an important source of information relative to man's food supply, utensils, and equipment and also contains medical instructions, home remedies, and herbal pre-

parations. Menus from old hotels show the changing trends in American living and cating habits.

There are several illustrations and each of the four parts is preceded by a short introduction.

T. R. Van Dellen, M.D.

TRAUMATIC CERVICAL SYNDROME AND WHIP-LASH. C. W. Goff, J. O. Alden, and J. H. Aldes. J. B. Lippincott Company, Philadelphia, 1964.

The authors have produced a remarkably concise monograph on neck injuries, which has a total of 114 pages of text.

The book begins with a discussion of the semantics involved in traumatic cervical syndrome and whiplash and indicates that these terms are used with full realization of their drawbacks.

The frequency of cervical injuries is discussed in Chapter 1. An analysis of the incidence in hospitals is correlated with the findings of insurance agencies. It is apparent that cervical syndromes have become a significant cause of disability throughout the country.

The second chapter deals with the acute traumatic cervical syndrome and discusses separately the problem in children and in adults.

The third chapter deals with the more serious problems of dislocations and fractures, while the next section is concerned with the chronic problems related to the neck. A concise discussion of the treatment, both operative and conservative, follows. The differential diagnosis is considered succinctly.

One chapter deals with pertinent aspects of anatomy, and another is concerned with clinical and experimental physiology and pathology.

The final chapter is concerned with disability determinations. There is an appendix devoted to post-traumatic neurosis. A satisfactory list of references is provided.

The majority of illustrations are line drawings which have been carefully selected and illustrate the text in a satisfactory manner.

The book is easily read and and provides a capsule survey of neck injuries. The book should be of interest to anyone who is interested in the problems associated with trauma.

John M. Beal, M.D.

CARDIAC SURGERY. By John C. Norman, M.D., The Appleton-Century Crofts Company, New York, N.Y., 1967, 603 pages, \$9.75.

The purpose of this multi-authored synopsis of cardiac surgery is to present "in brief usuable form, a series of points of view." The 56 contributors do this clearly and concisely. Many phases of heart surgery including basic physiology, anatomy, diagnosis and therapy are incorporated into each section.

Section I deals with cardiopulmonary physiology, anesthesia, bypass and perfusion techniques. Recent advances are included in the discussion in this section. The bibliographies are current and pertinent. This section is recommended for those interested in cardiac surgery.

Section II and III cover cardiac surgery in infants, children and adults. Problems in diagnosis and treatment are presented in a logical orderly manner. One minor drawback is the repetition and overlapping of the chapters on congenital heart disease. Otherwise these two sections of the book outline rather completely, available techniques for evaluation and surgery of congenital and acquired heart disease.

Complications of cardiac surgery are dealt with in section IV. The information in this section has practical application for surgeons caring for those diseases. Methods of handling problems in shock, infection and clotting abnormalities are clearly presented.

The final section presents recent developments in transplantation of the heart, assisted circulation and artificial prostheses. These topics point to the future of cardiac surgery and thereby complete the editor's purpose to present "a concise cross-sectional sampling of multidisciplinary thinking in contemporary cardiac surgery."

J. Conn, Jr., M.D.

HAND BOOK OF ORTHOPAEDIC SURGERY, A. R. Shands, Jr., R. B. Raney, Sr., and H. R. Brashear, C. V. Mosby Co., St. Louis 1967. 474 pages.

The first six editions of the Handbook of Orthopaedic Surgery have been good books. This seventh edition is an improvement over those preceeding it and is outstanding.

The stated objective of the book is to "present fundamental facts and principles

of orthopaedic surgery as concisely as possible yet in sufficient detail to convey a well-rounded knowledge of the subject." This objective has been amply met. The difference that elevates this book above others is the detail that the authors are able to present while keeping this volume in handbook size.

The text outline is basically unchanged from previous editions. Outdated portions have been revised or deleted. New material has been added to keep the text current. The first half of the book covers congenital deformities, general skeletal affections, infections, arthritis, neuromuscular disabilities, tumors and fractures. The second half of the book is devoted to a discussion of regional disabilities of the body.

The bibliography containing 1,400 references of the most important and current articles is an added feature of the book.

This excellent book should be in the library of every medical student and orthopaedic resident. Any physician who is faced with orthopaedic problems in his practice will find this book a valuable aid in the diagnosis and care of these patients. Finally this book furnishes an excellent reference and review for practising orthopaedic surgeons.

David C. Bachman, M.D.

Neuro-Ophthalmology. Edited by J. Lawton Smith. 278 Pages. The C. V. Mosby Co., St. Louis, 1965, \$21.75.

This book is a transcript of the second symposium on clinical neuro-ophthalmology sponsored by the University of Miami and was held in Miami in January 1965. Like the first symposium it was directed to the clinician but unlike the first papers presented represented the current interests of the speakers rather than an arbitrary topic which had been assigned to them. For this reason the communications are authoritative, timely and interesting. For example Smith writes on seronegative neurosyphilis, Norton writes a flourescein angiography of the retina, Hollenhorst contributes a paper on strokes and Hedges speaks on occlusive vascular disease. It will be noted that these (and other topics not mentioned) are all of clinical interest. Basic anatomy and physiology of nerve pathways were not discussed except where they applied immediately to the subject at hand. A beautiful illustration of this is the paper by Lindenberg on neuropathology involving the lateral geniculate bodies, the optic radiation and the calcarine cortex. In all of the three sections there is a short presentation of the anatomy involved but the major portion of the discussions are devoted to case reports that illustrate the effect of vascular, degenerative or neoplastic lesions on the structures noted above. Indeed this article alone is worth the price of the entire

Perhaps the best recommendation that can be given is to say that this volume has the same aura of authoritative pedagogy that surrounds the editor when he lectures to an audience. All ophthalmologists with an interest in neuro-ophthalmology (and this should include *all* ophthalmologists) will benefit from reading this compilation of the current work of the authorities in the field.

David Shoch, M.D.

Surgical Grand Rounds (Continued from page 716)

ankylosis. Because it is not possible to perform a complete synovectomy, x-ray therapy is used to destroy what remains of the synovium. While it is unusual to have to perform an amputation or even a fusion, the patients continue to have difficulty with the knee. They are helped by a combination of surgery and radiation but they are not cured. Many of these have evident bony invasion. The synovitis may destroy not only the articular cartilage but also the sub-chondral bone.

Dr. John Beal: Dr. Stack, do you consider this to be a malignant neoplasm of the joint?

Dr. Stack: This is not a frankly malig-

nart process but it may become locally recurrent and locally destructive.

Dr. Beal: Would you explain how the knee joint recovers if the synovitis is controlled by synovectomy and x-ray therapy.

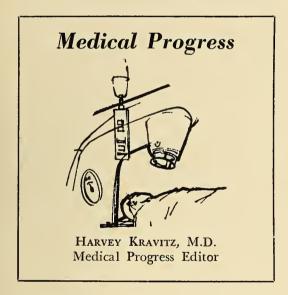
Dr. Stack: When the pannus has been removed and cartilage destruction ceases, it is hoped that the joint surface will be covered by fibrocartilage. In some conditions we drill the bone with multiple drill holes through the cartilage and into the condyle in order to promote the growth of fibrocartilagenous tissue. This is not advisable under these circumstances for fear that the remaining disease will invade the openings that you prepare.

The Patient With A Major Acute Coronary Attack and The Role Of A Coronary Care Unit

By Oglesby Paul, M.D., Carl G. Leigh, M.D., and Gerry A. Smyth, M.D.

INTRODUCTION

The problem of the patient with an acute life threatening coronary episode has been variously viewed in recent years. The magnitude of the problem of the individual who has an attack of coronary origin and succumbs before any help can be summoned or resuscitative measures employed has been stressed by Kuller, Lilienfeld and Fisher.¹ They have reported that about 60 per cent of all deaths from coronary disease occurred



in patients who never reached a hospital or physician in time to benefit from any medical measures. A complex interaction of factors doubtless is involved in this sobering study. Greater availability of emergency medical services, a broader awareness by physicians of the importance of the clinical picture of impending infarction, and better understanding on the part of the public of symptoms highly suggestive of myocardial infarction might all contribute to a greater salvage of human life.

The pathology and physiology of an acute

coronary attack have been the object of much study. That death might occur only from an ischemia-induced arrhythmia without demonstrable acute occlusion of infarction was clear. That the process of coronary stenosis or occlusion was accompanied by the development of collateral channels was also amply demonstrated. Further it was known that areas of acute infarction undergo repair with formation of a strong scar and actual shrinkage of the involved area by fibrosis to give adequate myocardial function in many patients surviving the acute phase. Thus, there was a scientific basis for the concept that should the physician be able to tide the patient with an acute coronary event through the initial stages, means of repair permitting a return to useful living were available.

Investigate Ways to Prevent Death

Another aspect of the problem involves investigations to develop ways either to prevent death or in essence rescue the patient from the very jaws of death itself at the time of an acute episode. Crucial and indeed historic was the basic work of Kouwenhoven who found by appropriate application of an electric shock that ventricular fibrillation could be terminated. Subsequent and equally important investigations by Kouwenhoven, Jude and Knickerbocker,2 provided a simple and readily mastered technique combining the maintenance of adequate ventilation and circulation without mechanical equipment. More recently, the role of synchronized direct current shock as described by Lown,3 the contribution of several drugs reducing ectopic cardiac excitability, and refinements in the means of monitoring particularly the venous pressure, heart rate and rhythm all offered opportunities for wide application to clinical problems. Active investigations in mechanisms and cardiogenic shock, to electrical pacing and therapeutic approaches to bacteremic of the heart, and to congestive heart failure complemented further the contributions suitable for hospital trial.

Yet another aspect thus involved the development within a hospital of a coordinated service aimed at applying the newer knowledge mentioned above both for the prevention and treatment of complications of an acute coronary attack. The question was: could the newer approaches be understood and effectively and economically used by physicians, nurses, and other health personnel throughout the hospital, or were the approaches sufficiently complex and expensive and the nature of the patients' problem so varied and difficult that patients with major acute coronary events should be segregated with specialized equipment and with their own trained attendants. It soon became apparent indeed that the newer methods of management of acute life threatening cardiac arrhythmias or arrest must be made available to any patient in any room or ward in the hospital if full advantage was to be taken of them. A coronary attack could occur on any adult medical or surgical service at any time. Thus, indoctrination of all physicians and nurses in cardiopulmonary resuscitation was clearly imperative, and provision for a mobile unit with equipment for monitoring the cardiac rhythm and with an electrical defibrillator and with the necessary medications and intravenous solutions was similarly necessary. Whether or not a selected chosen team was to be responsible for utilizing the mobile unit or whether this was to be a general responsibility clearly

varied with the size of the hospital and the number of personnel who might be at hand.

Dissemination of Resuscitation Principles

It was also readily apparent that a concentration in one area of patients particularly prone to need the application of specific preventive resuscitative and therapeutic measures would be most economical and efficient. Monitoring equipment carried a sizeable price tag and could not be permanently installed by every hospital bed. Further the skill of nurses and physicians in handling these acute cardiac emergencies was directly proportional both to the adequacy of the training and the extent of the experience. There appeared no important difference of opinion therefore in the concept that a specialized coronary care unit was a desirable feature of a general hospital both to give maximum utilization of monitoring devices and to concentrate trained personnel in an area providing a continual exposure to critically ill coronary cases. It must be stressed again however that knowledge of the principles and practice of cardiopulmonary resuscitation must be widely disseminated beyond the confines of such a unit. Because of the dual nature of this concept and because the existence of a coronary unit in itself elevates the standard of care of cardiac emergencies throughout an institution, it is difficult to get valid statistics to demonstrate the exact contribution a unit makes in terms of lives saved. It is the firm belief of all who have had experience in the field that a coronary care unit has been of undoubted worth in saving lives which would otherwise be lost.

PHYSICAL DESIGN AND LOCATION

The design of the unit should provide for maximal patient tranquility and privacy without sacrificing the principles of constant surveillance and the proximity of help. To this end the beds should preferably be in separate rooms or compartments so arranged and constructed that when appropriate the occupants are protected from seeing or hearing what is happening elsewhere in the unit. Observation of cardiac arrest and the initiation of resuscitative measures is hardly a soothing experience for other patients. It is really essential to have a display of the electrocardiograms of all patients visible at a central nursing working area (we prefer

a multi-channel oscilloscope) and the tracing of each patient obtainable also at his bedside on a direct writing electrocardiograph machine or individual oscilloscope. We feel that direct vision of all patients from the nursing station is also desirable although there has been criticism that this type of constant surveillance itself subjects the patient to emotional stress. This objection can be overcome, however, by the use of curtains or movable partitions which can be closed for short periods when absolute privacy is desired. The distance to each bed from the central nursing station and from the resuscitation cart should also be as short

as possible. An alarm system triggered by heart rate changes must be audible throughout the unit. A number of imaginative layouts for units of various sizes incorporating these various features have been described. Some authorities feel that the goals of the unit can best be attained by dividing it into a larger section for observation of convalescent or routine cases, and a smaller completely closed room to which patients requiring more intensive management may be moved. Such a plan is most feasible for a large hospital with a sizeable patient load.

Adequate Space Needed

There should be adequate space about each bed for the extra equipment and personnel needed for resuscitation. Ten by ten feet is quoted as a minimal dimension. The ideal unit also provides for good lighting and cheerful surroundings including a window if possible, wide doors so that the patient might be moved in and out in his own bed, and the use of ceiling and wall attachments to avoid clutter. Air conditioning is necessary not only for patient comfort but also for the upkeep of the sensitive electronic equipment. Special care is needed in planning the wiring to insure a constant and protected electrical supply and adequate grounding.

The location of the unit will depend upon the size and type of the hospital. It has been recommended that it be easily accessible from the emergency entrance and that it be proximal to the intensive treatment area so as to allow for the quick transfer of patients requiring aggressive management as well as for the interchange of personnel and supplies. This arrangement may be less desirable in a hospital with adequate house staff, where the medical and surgical patients are on different floors and the house staff is geographically assigned. By keeping the unit on a medical floor there is closer and more adequate house staff support (unless a separate resident and/or intern are assigned to the unit) and the patient can continue to be followed by the same team that cared for him in the unit once he has been discharged to a regular bed. In all cases we would warn against including the coronary care unit in the general intensive care area where unsettling signs and sounds and general hubbub from postoperative, traumatic and other acute medical cases cannot be eliminated. Also, we do not favor the continual interchange of nursing personnel with the general intensive treatment area because this results in an undesirable dilution of hard earned skills.

WHAT TO MONITOR AND CHOICE OF EQUIPMENT

In setting up a unit, it is extremely useful to have the advice of an electronic specialist not connected with one of the companies selling equipment which may be used in the unit. It is also most helpful to visit various units already in existence to get first hand information regarding operational problems including frequency of breakdowns, servicing of equipment, cost of such service, etc.

Electrocardiographic monitoring equipment is of course standard in every coronary care unit to assist the medical personnel in the observation of cardiac patients so that not only major changes in rhythm, but also lesser deviations from normal may be noted sooner and more easily treated than by mere periodic observation. The electrocardiographic monitors operate through electrodes on the chest to transmit the ECG signal to the bedside and also to a central panel (usually multiple-channel) oscilloscope and to transmit audible and visible signals with each heartbeat. Usually long leads are used

but telemetering is possible. These bedside units should be equipped to power either an external or an internal pacemaker which may be set to function automatically should cardiac asystole occur.

Bedside Monitor

An electrocardiographic monitor is thus available by each bed and the ECG should be displayed there on a bedside oscilloscope or on a direct writer which may be activated either as desired or at pre-set intervals or with a change in rhythm. Each bedside unit is connected to the central panel at the nurses' station, which includes a multiplechannel oscilloscope and/or a direct writer and also heart-rate meters with the alarm system. An audio-visual alarm system, which is also activated usually by changes in the rate should be included. Such devices as "memory loop" tape systems are useful but not essential. Electronic monitoring of other physiological functions such as blood pressure, respiratory rate, and temperature has

been established in some units, and may be advantageous at times; however, it is generally felt that the less complex the system is, the less opportunity there is for equipment failure. Furthermore, frequent observation by nurses helps to assure superlative bedside care.

Aside from a small bedside table and chair, the space about the bed should be as unencumbered as possible. Located at the head of the bed are outlets for oxygen, electrical outlets, suction, intercom system (in a large unit), and perhaps conduits for future monitoring possibilities.

Therapeutic and Emergency Equipment

Therapeutic and emergency equipment should include an external and internal pacemaker as noted, plus a direct current cardioverter for treatment of serious arrhythmias (an additional one should be available either within the unit or elsewhere in the hospital for the rare simultaneous emergencies), intermittent positive pressure respirators when inhalation therapy is required, automatic rotating tourniquets for treatment of acute left ventricular failure (optional), and bedboards to provide firm

support of the thorax during cardiac compression. An emergency drug cart must be at hand which should be provided and stocked on a regular basis by central supply under the direction of the Director. Ambu bags, airways, and intubation and suction equipment must also be provided. Sterile sets for cut-downs are of course essential.

Some units have included mechanical heart massage apparatus to be employed when closed-chest massage is required for some length of time. We still feel that the individualized attention by the medical personnel is superior to such apparatus.

In order that the nurses in the unit may give their full attention to patients, assistance from elsewhere in the hospital should be immediately available to them. Central supply and the pharmacy should preferably replace or replenish supplies according to a prearranged schedule, to relieve the nurse of checking inventory and preparing requisitions. An intercommunication system between the nurses in the unit and those on the general floor is a necessary safeguard for handling emergencies efficiently, as well as an emergency system for summoning a cardiac arrest team.

ADMISSION AND DISCHARGE POLICY

It does not take long for the existence of an intensive coronary care unit to be widely known throughout a hospital and a community. It also does not take long for physicians and patients and their families to appreciate the advantages of a unit in terms of constant surveillance and skilled 24-hour nursing. There is thus an understandable tendency to admit to the unit almost any patient who may have an acute coronary episode, an arrhythmia, congestive heart failure, or other illnesses in which cardiac complications conceivably might occur. It is therefore essential that a fair and reasonable admission policy be determined and publicized. It is our belief that an intensive coronary care unit is most suitable for two types of patients: 1) those with a probable or definite acute myocardial infarction, and 2) those with an arrhythmia which is life threatening or difficult to document. We have found it convenient to divide the myocardial infarction population presenting on admission into three groups: possible, probable, and definite; we do not admit the first category to the unit, but do accept the other two groups. We believe that congestive

heart failure not due to acute myocardial infarction is usually as well treated outside a coronary unit as in it and such patients are not candidates for admission to this special facility. Likewise, we have not usually accepted patients with uremia, diabetic acidosis, or other abnormal metabolic and biochemical states unless special circumstances involving major arrhythmias and their management exist.

Discharge Policies Vary

There is great variation in discharge policy from coronary care facilities. It has been our philosophy that while the duration of stay in a unit must be flexible and adjusted to the requirements of each individual patient, it is fair to assume that the most hazardous period is the first few days after infarction or after a major complication of infarction. It is also our philosophy that it is to the advantage of the patient in terms of self-confidence and morale to graduate from a unit before he or she becomes excessively dependent upon it and its services and staff. Further, it is our belief that with the current general shortage of nurses that

such individualized and highly trained care is not economically justified once the patient has passed through the most critical period. In addition, the presence in an acute facility of many uncomplicated convalescent cases clearly alters the attraction and suitability of the facility for personnel trained to handle emergency and critical situations. Therefore, we have chosen arbitrarily to aim to keep patients in our coronary care unit for five days after the cessation of significant pain or five days after a major complication.

In some instances, an earlier discharge has been necessitated by the pressure of patients arriving in the emergency room needing admission. In other situations, a more prolonged stay has been indicated due to the existence of special factors of personality, past history, etc. As indicated above, it is important that a named individual or individuals be charged with the responsibility for enforcing a fair admission and discharge policy.

DIRECTION

Just as with any specialized functional area of a hospital such as a dialysis unit, it is essential that a coronary care unit have a director, whose function will vary depending upon the size and type of the hospital in which the unit is located. In some of the original coronary care units, the director was in complete charge of each patient admitted to the unit; when the patient was transferred from the unit to the general nursing floor, the original attending physician would resume the patient's care. In our unit, the attending physician cares for the patient without interruption, whether within the unit or without. The director participates in the design of the layout and interior of the unit. Together with the administrator of the hospital, the director will order specialized equipment for the unit, and he will serve as a guide for the use of techniques, new drugs and parenteral solutions. He will supervise the admissions and the discharges and policies of the unit,

plus the individual decisions as to which patients properly belong within the care of the unit. Furthermore, he may be the appropriate physician to organize information derived from patients' charts, for current and subsequent research projects.

The director should be responsible for the smooth operation of the unit and make helpful suggestions to any house staff and to the attending staff as to procedures and techniques. He should also supervise training programs required for the unit. Although the medical director of our unit does not assume primary medical care of other physicians' patients within the unit, he may of course make pertinent suggestions to any individual physician, as well as issue memoranda to the attending staff at large regarding such matters, as a change in policy, a new course in drug management, or stricter supervision of the admissions of the unit.

NURSING

It is a basic premise in the concept of the coronary care unit that it is the nurse and not the physician who is often present when a change in the patient's course occurs. If the unit is to function effectively she must be able to recognize that change at once and take steps to insure the institution of appropriate management without awaiting specific orders from a physician. Thus, her role is considerably broadened from that expected of her by tradition and unless she is fitted for it by reason of intelligence, motivation and training the unit will have little value despite the most advantageous design, the finest equipment and the eminence of the medical staff.

The unit director is responsible for insuring the competence of the nursing staff.

Prior to the opening of the unit, a specialized program of instruction should be provided to inculcate the nurse in a clear understanding of the concept and goals of the unit and of her role in it. Emphasis is given to the development of proficiency in the interpretation of arrhythmias from the electrocardiogram, in the operation and maintenance of the specialized electronic equipment of the unit, and in cardiopulmonary resuscitation. The anatomy and physiology of the circulatory system are reviewed and lectures devoted to the pathology, signs, symptoms and complications of coronary artery disease should be nearly as detailed as in medical school courses. Special attention is given to insure that she has a working knowledge of cardiovascular

drugs. She should be made aware of the psychologic needs of the acute coronary patient so as to be able to provide him with the emotional support that is so important. Initial indoctrination is ordinarily by a series of lectures and demonstrations but an ongoing educational program is essential. The nurses should be active participants in a weekly review of cases in which their performance is as carefully assessed as is the roles of attending and house staff. They should be encouraged to save all electrocardiographic strips with unfamiliar rhythms for subsequent discussion and debate.

Duties Precisely Outlined

The exact duties of the nurse will depend upon the type of hospital and the availability of physician support but in every instance they must be so precisely outlined that her actions cannot be blunted by uncertainty once a problem has arisen. For instance, even in institutions with an abundant house staff there will be an occasional instance when a physician is not immediately available upon the development of ventricular fibrillation and when this happens a nurse should be authorized to deliver the electric counter-shock. When a transvenous electrode is in place but inoperative

and ventricular standstill is detected she would immediately activate the pacemaker. With less catastrophic complications requiring drug therapy she will ordinarily await specific orders from a physician, but in hospitals without a house staff it may be necessary to authorize her to administer drugs based upon her own assessment of the situation at that time.

The legal implications of the expanded role of the nurse in coronary care units have been considered and while as yet there are no known suits based upon the application of resuscitative measures by a nurse, it has been recommended that the hospital and the nurses receive protection by a policy statement written by the coronary care unit director or committee defining those measures they are authorized to carry out upon the completion of their training.

The number of nurses in a unit will, of course, depend upon the size. One nurse for every two to three patients is optimal. Because cardiopulmonary resuscitation is more effectively performed by two people, it is desirable to have at least two in the unit at all times. In view of the skill and judgment required, it is our impression at present that the nurses should be selected from the graduate staff only.

THE PATIENT AND HIS PHYSICAL ACTIVITIES

In the past physicians have often required that the treatment of acute myocardial infarction be based upon absolute bedrest. Absolute rest has been advised upon the premise that a minimum of three weeks and up to eight to twelve weeks are required for formation of a satisfactory scar following myocardial infarction, and that effort during the period of healing before formation of a firm scar is to be avoided at all costs. Actual myocardial rupture itself however rarely occurs after the tenth day. The potential disadvantages of prolonged bed rest have included complications of pulmonary embolism, pulmonary and urinary tract infections, prostatic obstruction, negative nitrogen balance, loss of calcium with osteoporosis, and mental depression. Perhaps even more important the patient develops marked generalized muscular weakness and several months may be required to return to a state of physical fitness.

We believe that the patient with acute infarction should not lie motionless in bed.

The shoulder-hand syndrome may be prevented by appropriate arm and shoulder exercises instituted in a coronary care unit. Pulmonary embolism may be prevented by a regular routine of leg exercises. The patient is encouraged to take deep breaths at regular intervals throughout the day to ventilate fully the alveolar spaces and to avoid perfusion of unventilated lung segments leading to a drop in arterial oxygen saturation.

Commode vs. Bedpan

The Valsalva maneuver experienced in the physiologic response of straining at stool has long been known to produce a sudden increase in the intrathoracic pressure resulting in decreased venous return and a compensatory increase in cardiac rate. During the post-straining period, fatal arrhythmias may result. The oxygen requirements of the heart are greater during pressure loads than during volume loads and physicians have concluded that far less

energy is expended by the heart when the patient uses a commode properly than when he is forced to exert himself upon the bedpan. The patient in a coronary care unit should be instructed to turn to his side, and to dangle his legs at the edge of the bed while a nurse helps him assume the erect sitting position; he then uses his feet to pivot from the bed to a nearby commode, thus avoiding the stress of sitting upright in bed on his own from a supine position. The same procedure is utilized in reverse order

as he returns to bed. He should receive sufficient stool softeners or laxatives to avoid any necessity for straining or manual removal of impactions.

Undue conversation with relatives and friends also constitute a very considerable physical effort for the individual with acute myocardial infarction. We have found it wise to limit visitors in a coronary care unit to five minutes out of each hour, and these are customarily selected only from the immediate family.

ARRHYTHMIAS

The detection and treatment of arrhythmias have long been considered to be major reasons to hospitalize patients with acute myocardial infarction. Coronary care units have greatly facilitated both this detection and management and indeed the major objective of a coronary unit has become the reduction of mortality from arrhythmias. In addition, the units have progressed to the more important role of preventing many arrhythmias before they commence by permitting the nurse or physician to recognize the warning signs of certain alterations of rhythm.

There are factors which tend to favor the development of arrhythmias which need to be controlled such as pain, hypotension, heart failure, digitalis excess, psychological stress, electrolyte imbalance, and diversion of blood flow from the heart to the splanchnic bed following ingestion of heavy meals. There are some who believe that several types of arrhythmias are best left alone. In studying the natural history and clinical significance of arrhythmias after acute myocardial infarction, Fluck and coworkers4 proposed a new clinical grouping of arrhythmias based on the overall cardiac response to the dominant arrhythmia during the first 10 days after infarction. A continuous ECG recording was begun immediately on admission to the hospital of 50 persons with myocardial infarction. They found that the first group of supraventricular tachycardias (atrial or nodal tachycardia, atrial flutter or atrial fibrillation), were all paroxysmal, self-limiting, and relatively benign, ceasing spontaneously by the end of the first week. These occurred primarily in anterior infarcts. The second group characterized by atrial transport dysfunction including nodal rhythm and A-V dissociation was associated with a fall in blood pressure

and finally ceased spontaneously; intravenous atropine was felt to be of some help. A third group with a supraventricular bradycardia, with slowing of the heart or wandering pacemaker, occurred primarily in inferior wall infarcts and was associated with either vasovagal attacks or prolonged sinus bradycardia. The significance of the fourth group with ventricular tachycardia varied with the underlying risk of the individual patient. All eight patients of the fifth group with a ventricular bradycardia, (complete heart block or idioventricular rhythm) died. These also were found primarily in inferior wall infarctions. The final group of sinus arrthymia, or extra-systoles only, was associated with no morbidity or mortality. In this study the authors used no quinidine, no procaine amide and employed digitalis only for prolonged atrial fibrillation.

Premonitory Derangements

This conservative approach, while admirable in many respects, is acceptable only to a minority. The very existence of a coronary care unit challenges those who would merely observe. In a recent report, Lown et al.5 point out that there are certain "benign" arrhythmias which require prompt treatment because they are often the harbingers of catastrophic electrical failure of the heart beat. These premonitory derangements include ventricular premature beats, bradycardia and A-V block. By careful attention to the warning signs and by using flexibility and individualization of prophylaxis and treatment of arrhythmias they were able to report not a single case of primary ventricular fibrillation and only one case of ventricular asystole in 130 consecutive unselected patients with acute myocardial infarctions. Ventricular premature beats were a frequent

abnormality and might be expected to develop into ventricular tachycardia and ventricular fibrillation. A slow heart rate could compromise the cardiac output and thereby promote hypotension, ischemia and perhaps increased automaticity of ectopic pacemakers. Prolongation of A-V conduction could terminate in an advanced degree of heart block and asystole.

Prophylactic Use of Quinidine

Because the overall incidence of arrhythmias in acute myocardial infarction with continuous ECG recordings remains from 70-90 per cent, some centers have advocated routine prophylactic quinidine treatment immediately after admission to the hospital. In a double blind study Holmberg and Bergman⁶ studied 104 patients with a verified diagnosis of myocardial infarction and administered a sustained release form of quinidine sulfate for 14 days, beginning within the first 24 hours of admission. Their results are interpreted to show that prophylactic administration of quinidine probably has an arrhythmia-inhibiting effect, especially in patients with high transaminase values. Others have failed to observe similar benefits. The routine prophylactic use of quinidine has not been adopted by most workers in the field, particularly since it depresses myocardial contractility and may at times itself precipitate a ventricular arrhythmia. We agree that treatment should be individualized and not standardized.

Sporadic ventricular premature beats need not be routinely treated. However Lown⁵ has listed four criteria for initiating prompt therapy: (1) occurrence early in the cycle, with interruption of T waves; (2) salvos of two or more; (3) multiform configuration; (4) occurrence with a frequency greater than five per minute. The coronary care unit offers an excellent opportunity for identifying these factors. Treatment may be by intravenous injection of 50 mgm. of lidocaine or infusion of an 0.02-0.1 per cent solution, by intravenous infusion of procaine amide (300-500 mgm. every 4 hours), or by oral procaine amide (500 mgm. or more every 4 hours).

Ventricular Tachycardia

Ventricular tachycardia may be a threatening or a terminal event in an episode of acute myocardial infarction, representing a true medical emergency. Ventricular fibrillation itself constitutes to a greater extent an emergency, although both ventricular tachycardia and fibrillation may occur in paroxysms and terminate spontaneously. Should either be recognized in this paroxysmal form, prophylactic use of 50 mgm. of lidocaine or 100 to 300 mgm. of procaine amide intravenously is urgently indicated, followed by more sustained prophylactic therapy as indicated. Sustained ventricular tachycardia may be handled with intravenous drugs as above or with electric shock; sustained ventricular fibrillation necessitates one or more electric shocks.

Atrial ectopic beats noted infrequently require no special consideration or management. When they occur in a coupling or trigeminal pattern, they may herald the later development of atrial flutter or atrial fibrillation, and may be suppressed by quinidine. Atrial flutter or fibrillation are usually first treated with digitalis which both increases the degree of A-V block and may terminate these arrthymias. Should they be sustained and unresponsive in rate to digitalis, quinidine in conservative dosage may be used to attempt conversion to a sinus rhythm, or infrequently electric shock may be indicated.

Treatment of A-V Block

A sinus bradycardia usually warrants no specific therapy unless the rate falls below 50. Should there be a decrease in the volume of urine, a cool moist skin, or a drop in blood pressure intervention is especially indicated. The use of atropine sulfate (0.3-1.0 mgm. I.V.) may be exceedingly helpful.

A coronary care unit offers a particular opportunity to monitor and treat A-V block. A first degree A-V block, often very transient, usually requires no treatment. Should it progress to a second degree A-V block, there is a real concern arising from the bradycardia which may accompany this with a fall in cardiac output, and from the likelihood of the development of a higher degree of block with episodes of arrest of the ventricles. For this reason, many recommend that patients with acute infarction with second (as well as with a complete block) should have a transvenous electrode passed into the apex of the right ventricle to provide standby or actual pacing. Such a precaution again emphasizes the value of a special facility which permits instant recognition of a change in rhythm and with a second degree A-V block allows immediate

institution of pacing should this be required. Some also point to the value of an isoproterenol infusion as another approach (1.0-1.5 mgm. in 500 cc. of 5% D/W) to speed the heart rate and perhaps to avoid the necessity of use of electrical pacing. The pharmacologic and electrical methods are indeed complementary and are not antagonistic.

Asystole itself is a most formidable problem. Sometimes responding to prompt initiation of ventilation of the lungs and cardiac massage, sometimes responding to a brisk blow over the precordium, in others it yields to intracardiac epinephrine or calcium chloride. Should an electrode be already placed in the right ventricle, temporary pacing may lead to an eventual recovery of spontaneous cardiac activity. The prolonged use of external pacing is unsatisfactory.

Problems in Acid-Base Balance

Problems in acid-base balance may be a factor both in the appearance of arrthymias and in making them refractory to therapy. In a study of 10 patients with complications of an acute myocardial infarction in a coronary care unit, Cohen and Uhley⁷ found that nine of the 10 had severe acid-base disturbances at the time of these complications. One patient with chronic atrial fibrillation had experienced more than 20 attacks of ventricular fibrillation; after correction of the biochemical abnormality, the patient maintained a sinus rhythm. Therefore it is suggested that in some circumstances measurements of arterial pH and of CO₂ may indicate a need to combat acidosis with infusion of sodium bicarbonate with resulting beneficial effects on a tendency to arrhythmias.

CARDIAC FAILURE

It is not surprising that studies to date do not indicate that the management of acute myocardial infarction in coronary care units has resulted in a significant reduction in mortality from congestive heart failure. Obviously, many of these hearts are so massively damaged that their salvage must await the development of a workable pump to assist the circulation. In the interim, however, it is our impression that the units provide an improved setting for obtaining maximal benefits from conventional methods.

The concentration of case material provides opportunity for the practice that makes for the skillful employment of a number of techniques that are helpful in detecting this complication early and in assessing the effects of management, both favorable and unfavorable. The attending and house staff become adept at eliciting physical signs of failure including the presence of an S-3 or S-4 type gallop, pulsus alternans and abnormal distention and pulsation of the neck veins. Proficiency is obtained in placing the central venous catheter with minimal discomfort to the patient so that pressure readings can be recorded at frequent intervals. In some institutions the portable chest X-ray is being used routinely and effectively to detect interstitial pulmonary edema at a time when the lung fields are still clear to auscultation. The close cooperation of the nursing staff makes fluid intake and output records more reliable especially when diuretics are employed. The constant electrocardiographic monitor may permit the earlier detection of digitalis overdosage. The application of alternating tourniquets and the administration of oxygen by mask is less likely to be disturbed by technical malfunction because of the constant surveillance.

Preventing and Terminating Arrhythmias

Benefit also accrues to myocardial function from the program of preventing and terminating arrhythmias, since they have adverse hemodynamic consequences which may aggravate or precipitate cardiac failure. Cardiac output may be improved not only by controlling a tachy-arrhythmia but also by pacing a severe bradycardia due to A-V block and even by abolishing frequent ventricular premature beats.

Finally, it must be conceded that management of congestive heart failure in acute myocardial infarction is improved over what it was a decade or so ago because of refinements that preceded or occurred independently from the development of coronary care units. The prohibition against digitalis has finally been laid to rest but there is greater respect for the hazards of intoxication which may be especially lethal in the recently infarcted myocardium. In our experience and

that of others, the myocardium which has been acutely infarcted is very sensitive to digitalis. Rapid action is frequently necessary and for this the intravenous administration of preparations such a ouabain, lanatoside and digoxin is favored since the maximal effect of a single dose is evident often within thirty minutes, and by giving small repetitive amounts the desired result can be achieved with greater safety. Fluid and electrolyte balance are carefully watched because of the relation between digitalis intoxication and hypokalemia and because of the alterations that occur so often with heart failure, or result from its treatment with diuretics. Hypokalemia is a less frequent problem if mercurial rather than thiazide preparations are employed. Care is also taken to avoid a massive diuresis that might result in a sudden contraction of the intraluminal fluid space so as to provoke

thrombosis, and one half to one cc. of a mercurial diuretic given intramuscularly are usually adequate for a previously untreated edematous individual. For special difficult situations, intravenous ethacrynic acid may be indicated both because of its rapid action and its great potency. In a resistant case, fluid restriction will be helpful. For the immediate relief of respiratory distress in acute pulmonary edema opiates remain the drugs of choice and these can be supplemented by aminophyllin given slowly by vein or by rectal suppository. The increased incidence of complications when cardiac failure complicates acute myocardial infarction makes the use of anticoagulants especially desirable in these cases. With acute and progressive cardiac failure, a phlebotomy of 500 cc. may be life saving and is too often delayed.

CARDIOGENIC SHOCK

A coronary care unit is particularly well suited for the management of cardiogenic shock. This difficult and ominous complication of myocardial infarction is associated with a high mortality. There is no certain beneficial form of management, but a combination of careful observation plus specific therapeutic approaches may be helpful. It is important not to define shock merely by a blood pressure level, but by a combination of at least a low blood pressure (the systolic level is almost always below 100 mm. Hg.), cool clammy extremities, and a sharp reduction in urine output. The pulse pressure is usually narrow, reflecting a reduced cardiac output, and the venous pressure may be normal, low or elevated. In a coronary care unit, it is possible to follow the pulse and blood pressure frequently, and here it should be noted that recording of the blood pressure by a nurse with a sphygmomanometer is still preferable to indirect automated devices. Should the patient have difficulty in voiding, a catheter should be inserted to check the urinary output. Skin temperature readings from the extremities may easily be obtained, and in some centers a limited group of patients have had more elaborate studies including determination of the pH of the blood, direct arterial pressure, arterial pO2 measurements, venous oxygen saturations, and cardiac output by the dye dilution technique.

Measures to combat this situation will

vary with the role of contributing factors. 1) Thus, should shock be associated with supraventricular tachycardia or a marked sinus bradycardia or A-V block, the approaches mentioned earlier for arrhythmias may well be entirely adequate to reverse the picture. 2) Although narcotics are certainly needed to relieve pain, it has been pointed out by Shillingford8 that at times morphine may itself result in a pronounced fall in blood pressure. Thus some restraint in the use of narcotics and indeed of other drugs known to depress myocardial contractility (procaine amide, quinidine, diphenylhydantoin) is in order. 3) Avoidance of arterial oxygen unsaturation by encouragement of intermittent deep breathing to prevent perfusion of unventilated areas of lungs, and the use of oxygen by mask may be helpful although the exact contribution of the latter is uncertain since some vasoconstriction also appears. 4) Pressor agents have been employed for years without impressive and consistent results. There is general agreement that if any pressor drug is used, one with some inotropic action i.e. nor-epinephrine (Levophed) is the best choice.9 It is essential that hypertensive levels not be obtained with such a preparation. 5) The use of isoproterenol (Isuprel) -1.5 mgm. in 500 cc.D/W-has given some encouraging results in our hands. Through its inotropic action, it may raise the cardiac output with a resulting rise in blood pressure and urine

flow. Care must be exercised to avoid precipitating a ventricular arrhythmia by too rapid infusion. 6) Digitalis given intravenously in conservative dosage is desirable where signs of elevation of the central venous pressure and/or other signs including clinical pulmonary edema, X-ray evidence of pulmonary congestion, and the appearance of an S₃ are found. 7) The use of a plasma expander, low molecular weight dextran, has been reported by Borchgrevink and Enger¹⁰ in a group of myocardial infarction cases to be of no value, and indeed to be possibly harmful.

PSYCHOLOGICAL ASPECTS

In general, the atmosphere of a properly organized and operated coronary care unit is highly reassuring to the patient as well as to his relatives. The constant presence of a well-trained experienced nursing staff, and the awareness of the potential benefit of the electrical monitoring devices are almost always favorable influences. A calm and experienced manner on the part of all attendents including the physician is undoubtedly far more important psychologically than any amount of flashing lights and chromium plated devices. Such devices, if quiet, do not seem to be disturbing however. It is possible to have the patient develop an undue dependence on the unit and its staff. This can be usually avoided by limiting the stay in the unit to only the early and most hazardous phase of the illness. We have also found it beneficial to disconnect the patient from the monitor several hours before transfer so as to give a period of adjustment while in the same surroundings. We also endeavor to move the patient to a room on the same floor as the coronary unit so that he may have the same house staff members attending

him outside the unit as in so as to have both a continuity of care and the same familiar faces. The concentration of such acute critically ill cases together does of course result in a good chance that a death will occur in the unit with unfavorable effect on the others as yet more lucky. This is indeed a psychological liability to be accepted. It is our belief that the psychological benefits of a coronary care unit far outweigh this disadvantage.

Summary

Certain aspects involving the patient with a major acute coronary attack have been reviewed, especially as they involve the setting of a coronary care unit. The opportunity exists today through a better understanding of physiologic and pathologic derangements in myocardial ischemia and infarction, through a more clearly defined role of pharmacologic and electrical means of treating and preventing complications of heart attacks, and through improvements in the nursing care and physical facilities, to save lives and reduce morbidity.

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(Continued on page 738)

WALKING THROUGH ANGINA

There is great variability in exercise tolerance among patients with coronary artery disease (CAD) who suffer from angina pectoris (AP). In some the increased exercise tolerance depends on a preceding episode of exercise induced AP. The most complete expression of this phenomenon is the patient who is able to overcome an attack of AP by persisting in the precipitating effort until the pain disappears. After the subsidence of the pain the patient can continue the exercise without distress. A classical description of this phenomenon is found in a letter to William Heberden by an unknown patient: "I have frequently, when in company, borne the pain and continued my pace without indulging it; at which time it has lasted from five to perhaps ten minutes and then gone off." This phenomenon resembles the occurrence of "second wind" in athletes and described as "walking through one's angina."

The mechanism underlying the phenomenon of walking through an anginal attack or of getting warmed up by a previous anginal attack has profound implications in our approach to the management of these cases. The "walk through" phenomenon in MacAlpin and Kattus patients occured during a steady state of heart rate and arterial pressure and therefore is unlikely to be due to a decrease in cardiac work and oxygen need since we know that heart rate and blood pressure are major determinants of myocardial oxygen need. It must therefore be due to increased myocardial blood flow and reduced lactic acid and other metabolic accumulation

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"The basic conflict is between a sense of security, represented by the institution, and a sense of identity, represented by the individual. The institution guarantees security if you follow its rules. It will take care of you if you submerge yourself in it. However, with personal identity nothing is guaranteed. Only one person can and will work for your per-

sonal identity-you.

Countless institutions attempt to give you an identity, but only as defined and limited by them. They will describe your role as a physician, father, citizen, contributor, consumer, voter, etc. They will sell you on security by guaranteeing you success, but always in their terms. Seldom do institutions present you with unequivocal choices. The options they do allow are general and oversimplified. They replace your thoughts and choices with their rationalizations and precedents, and make it clear that there are plenty of ways of being a "nice guy." Too often it becomes coincidental for you to learn to be yourself. Like fire, institutions make excellent servants but poor masters insofar as morality is concerned. The individual generates values. An institution only transmits them.

Today every man is his own Doctor Faustus. Do you have a desire to see and know your real world, or would you trade your soul (identity) to someone for the promise of a fantasy world? Madison Avenue is particularly blatant on this point. Do you want to 'think young, look young, be young' or to be yourself? If you want the former, there are innumerable magic formulas you can drink, spray, soak, chew, or rub on or into yourself. For the latter, thought and choice are the only way.—Medical Opinion and Review (January) 1967. "But Everybody Cheats," Ralph

Cranshow.

The 25.8 million veterans now in civil life range in age from teenagers to over 90. Their average age is 44 years, according to the Veterans Administration.

The 1.88 million veterans of World War I range from about 65 to more than 85 years of age. Their average age is 73, according to the Veterans Administration.

A CONSERVATIVE, FOUR-POINT PROGRAM

The low back pain that is most frequently seen in general practice is mechanical in nature, i.e., postural back pain, joint dysfunction and acute back strain. For this type of discomfort, a conservative regimen is usually sufficient to relieve aches and pains, and to help keep the patient functioning. Components of this basic program include:



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Clinics for Crippled Children

Twenty-three clinics for Illinois' physically handicapped children have been scheduled for December by the University of Illinois, Division of Services for Crippled Children. The Division will conduct 15 general clinics providing diagnostic orthopedic, pediatric, speech and hearing examination along with medical social, and nursing service. There will be six special clinics for children with cardiac conditions and rheumatic fever, and two for children with cerebral palsy. Clinicians are selected from among private physicians who are certified Board members. Any private physician may refer or bring to a convenient clinic any child or children for whom he may want examination or consultative services.

Dec. 6, Alton Rheumatic Fever & Cardiac
—Alton Memorial Hospital

Dec. 6, Rock Island Cerebral Palsy—Foss Home, 3808 Eighth Ave.

Dec. 6, Carmi-Carmi Township Hospital Dec. 6, Hinsdale-Hinsdale Sanitarium

Dec. 7, Bloomington—St. Joseph's Hospital
Dec. 7, Springfield General—St. John's
Hospital

Dec. 7, Lake County Cardiac-Victory Memorial Hospital

Dec. 8, Chicago Heights Cardiac—St. James Hospital

Dec. 8, Evanston-St. Francis Hospital

Dec. 12, East St. Louis—St. Mary's Hospital Dec. 12, Peoria General—Children's Hospital

Dec. 13, Champaign-Urbana—McKinley Hospital

Dec. 14, Effingham General—St. Anthony Memorial Hospital

Dec. 19, Belleville—St. Elizabeth's Hospital Dec. 20, Springfield Cerebral Palsy (P.M.) —Diocesan Center, St. Paul's Cathedral 815 S. 2nd St.

Dec. 20, Chicago Heights General—St. James Hospital

Dec. 20, Aurora—Copley Memorial Hospital

Dec. 21, Litchfield-Madison Park School

Dec. 21, Effiingham Rheumatic Fever & Cardiac—St. Anthony Memorial Hospital Dec. 21, Rockford—Rockford Memorial Hospital

Dec. 21, Elmhurst Cardiac—Memorial Hospital of DuPage County

Dec. 22, Chicago Heights Cardiac—St. James Hospital

Dec. 26, Peoria General—Children's Hospital

The Division of Services for Crippled Children is the official state agency established to provide medical, surgical, corrective, and other services and facilities for diagnosis, hospitalization and after-care for children with crippling conditions or who are suffering from conditions that may lead to crippling.

In carrying on its program, the Division works cooperatively with local medical societies, hospitals, the Illinois Children's Hospital-School, civic and fraternal clubs, visiting nurse association, local social and welfare agencies, local chapters of the National Foundation and other interested groups. In all cases, the work of the Division is intended to extend and supplement, not supplant activities of other agencies, either public or private, state or local, carried on in behalf of crippled children.

The View Box

(Continued from page 713)

DIAGNOSIS: Medullary sponge kidney.

This is a rare condition which involves the medullary portion of the kidney, specifically the papillae. Microscopically there is a dilation of the collecting tubules which varies in degree and may actually become cystic. In 20-50 percent of cases (depending on the series), the cysts and dilated tubules contain calculi. The etiology is obscure. Clinically there may be no symptoms at all or recurrent bouts of inflammatory diseases and episodes of renal colic may occur.

The scout films may show numerous small calculi usually 1-2 m.m. in diameter in the region of the papilla. The process may involve both kidneys or only a segment of one kidney. The I.V.P. is more diagnostic than the retrograde pyelogram since it allows filling of the collecting tubules from the parenchyma and avoids pyelotubular backflow. The picture may vary from brush-like appearance of the tip of the papilla to contrast filling of numerous small cystic cavities with or without calculi. It is important not to confuse this condition with tuberculosis and papillary necrosis which are far more serious.

Reference:

Evans, J. A. "Medullary Sponge Kidney." Am. J. Roent. 86: 119-128, 1961.



Maybe he doesn't know when he's well off. But you might want to prescribe long-acting Novahistine LP anyway.

Two tablets in the morning and two in the evening will usually provide day and night relief by helping to clear congested air passages for normal, free breathing. Novahistine LP is formulated to provide continuous therapeutic effect for 8 to 12 hours. The decongestant ingredients help restore normal mucus secretion and ciliary activity—physiologic defenses against infection of the respiratory tract. Use cautiously in individuals with severe hypertension, diabetes mellitus, hyperthyroidism or urinary retention. Caution ambulatory patients that drowsiness may result. Each Novahistine LP tablet contains phenylephrine hydrochloride, 25 mg., and chlorpheniramine maleate, 4 mg.

NOVAHISTINE® LP



PITMAN-MOORE Division of The Dow Chemical Company, Indianapolis

for November, 1967 737

BEARD

If I may be allowed a slight diversion in this matter of beards, it would seem that man has worn his beard more often than he has shaved it; that the beard has been a special focus of theological dispute; that during past ages a shave once a month was agony, not only because they could not make satisfactory razors, but because they lacked soap; that after special prayers monks were shaved six times a year; that for a time shaving off the beard was prescribed as a heavy penance for laymen; that in 1880 a plea was made that soldiers might wear beards as a protection against chest diseases when on night guard; that apparently in all ages but ours shaving a man and cutting his hair short have been symbolic of castration. These details, and many more, you may find in that lighthearted treatise entitled Beards by Reginald Reynolds (Doubleday & Company, Garden City, NY, 1949). After reading it, you may come to have a deep respect for the mystic cry "Beaver." Arch. Intern. Med., Vol. 117, June 1966, page 831.

The major evidence today suggests only one avenue by which diet may affect the development and progression of atherosclerosis. This is by influencing the levels of serum lipids, especially serum cholesterol, though this may take place by means of different biochemical mechanisms not yet understood.

There can be no doubt that levels of serum cholesterol can be substantially modified by manipulation of the fat and cholesterol of the diet. We conclude, on the basis of epidemiologic, experimental and clinical evidence, that a lowering of the proportion of dietary saturated fatty acids, increasing the proportion of polyunsaturated acids and reducing the level of dietary cholesterol are the dietary changes most likely to be of benefit. The solution here, in our opinion, is a responsibility and opportunity for the food industry—namely, the manufacture of many common foods with characteristics that will lessen the development of atherosclerosis. This is possible today, and only awaits leadership from the food industry.

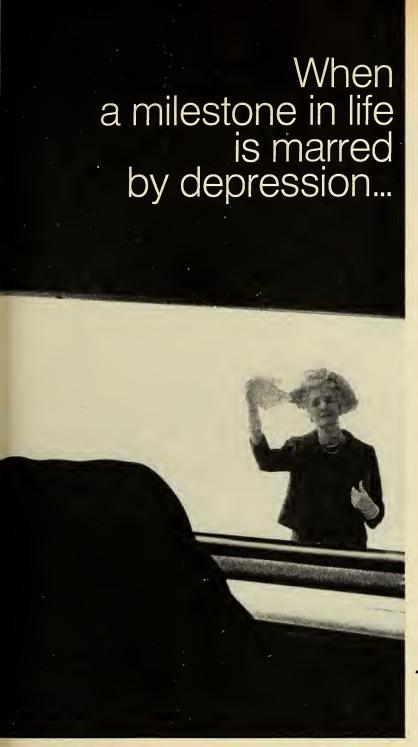
Limited evidence from studies on man as well as from researchers on laboratory animals show a slightly significant role for the kind and amount of dietary carbohydrate in the regulation of serum lipids. These effects are somewhat more pronounced when diets low in fat are consumed. Since diets low in fat and high in sugar are rarely taken, we conclude that the practical significance of differences in dietary carbohydrate is minimal in comparison to those related to dietary fat and cholesterol. Dietary Fats, Carbohydrates and Atherosclerotic Vascular Disease. Robert M. McGandy, M.D. et al. The New England Journal of Medicine, 277:5 (Aug. 3) 1967, pp. 246-247.

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Often in the mind of the lonely, widowed, depression-prone individual, she's not gaining a daughter...she's losing a son. The occasion may be marred by such symptoms of depression as feelings of sadness, incapacity, helplessness and hopelessness.

In about 3 out of 4 cases, Tofranil relieves symptoms of primary depression.

As maintenance therapy in primary depressive illness, it helps prevent relapse.

Although toxic reactions severe enough to require discontinuation of Tofranil are uncommon, in patients with cardiovascular disease, thyroid disorders, increased intraocular pressure, or in those receiving anticholinergics (including antiparkinsonism agents), the special precautions listed in the Prescribing Information should be carefully observed. The use of Tofranil in patients receiving M.A.O.I.'s is contraindicated.

which may require dosage reduction and/or addition of a tranquilizer or temporary discontinuation of the drug, epileptiform seizures, orthostatic hypotension and substantial blood pressure fall in hypertensive patients, pur-pura, transient jaundice, bone marrow depression including agranulocytosis, sensitization and skin rash including photosensitization, eosinophilia, and mild withdrawal symptoms on sudden discontinuation after prolonged treatment with high doses. Occasional hormonal effects (impotence, decreased libido, and estrogenic effects) may be observed. Atropine-like effects may be more pronounced (e.g. paralytic ileus) in susceptible patients and in those using anticholinergic agents (including antiparkinsonism drugs). Outpatient Adult Dosage: Initially, 75 mg. daily, increased, if necessary, to 150 or 200 mg. Maintenance dosage

may be lower, 50 to 150 mg. daily, if possible.

Initially, 30 or 40 mg. daily, which may be increased according to response and tolerance. It is usually unnecessary to exceed 100 mg. daily, a lag in therapeutic response, lasting from a few days to a few weeks, should be expected. When dosage recommendations are already being followed, increasing the dosage does not normally shorten this latency period and may increase the incidence of adverse reactions.

Availability: Tofrānil: Round tablets of 25 mg.; triangular tablets of 10 mg. for geriatric and adolescent use; and ampuls, each containing 25 mg. in 2 cc. for I.M. administration. (B) 46-850-A

For complete details, please refer to the full Prescribing Information.

Tofranil® imipramine hydrochloride Geigy



Geigy Pharmaceuticals Division of Geigy Chemical Corporation Ardsley, New York

ILLINOIS MEDICAL ASSISTANTS ASSOCIATION REPORT



"Doctor, Did Your Medical Assistant Attend??"

By JEAN BERSCHINSKI

The Eleventh Annual Meeting of the American Association of Medical Assistants met last month in Los Angeles at the International Hotel, with over 900 girls attending. This was no doubt the most interesting and fruitful meeting yet. The graciousness of the California girls and the hotel personnel was certainly outstanding.

The House of Delegates met on Thursday, Oct. 12, but before the business meetings started, there were many tours and interesting places for the girls to visit and all of these were thoroughly enjoyed. They included Disneyland, Knotts Berry Farm, Hollywood and other night club tours.

Illinois was represented by 30 members to see the National President, Mrs. Elvera Fischer, of Illinois, relieved of her office after a rewarding year of hard work as president. The increase in membership, work done on Certification, Scholarship funds, Insurance, etc., are just part of the things that progressed during her presidency. She must feel proud to reminisce, and rightly so. An open house punch party was held in her honor on Wednesday evening by the Illinois chapter.

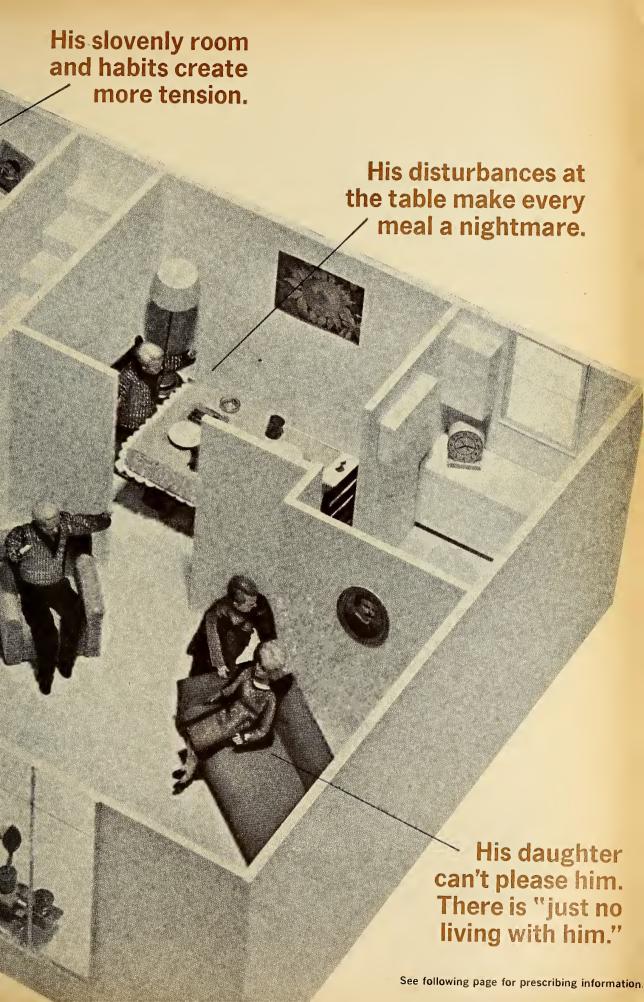
The election of officers was held and

Margaret Swank of Newark, Ohio, is our new president and Mildred Crawford of Texas, president-elect.

All day Friday was a symposium entitled "Knowledge Is Power" and doctors, lawyers, instructors, etc., made up a fool-proof and interesting panel to discuss medicolegal problems and panels on public relations, computers and even a little insight into "Tomorrowland for the Medical Assistant." The work shops offered help in many areas and we had the privilege of choosing ones pertaining to our work or interest.

The Inaugural Banquet was M.C.'d by a staff coordinator of the California Medical Association and Liaison to the California Medical Assistants and because he knew the girls and their association, it was most interesting and it was easy for him to compete with movie stars like Pat Buttrum, George Montgomery, etc.

All in all, there was a lot to enjoy and more than that, there was a lot to learn. I feel certain that every medical assistant attending this meeting came home with new enthusiasm and vigor and her doctor employer will notice improvement in the service she renders him.



When the agitated geriatric disrupts the home...

Anxiety that seriously interferes with the individual's performance at work, at home, or in the community may be regarded as moderate to severe in degree.

Mellaril often recommends itself to the treatment of moderate to severe anxiety because it

- · helps control the most frequent symptoms: marked tension, agitation, apprehension, restlessness, hypermotility
- often alleviates anxiety-induced somatic complaints
- · frequently helps strengthen emotional resources
- helps the patient maintain realistic contact with environment, closer harmony with family

Thus, when you consider the anxiety moderate to severe . . . consider Mellaril.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.

Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recommended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.

Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.

Before prescribing, see package insert for full product information.

for moderate to severe anxiety

(thioridazine) 25 mg. t.i.d.



Treatment of Alcoholism

Although the battle against alcoholism continues to be waged on a wide front with growing national appreciation and recognition, one Chicago hospital quietly proceeds to attack the problem in a unique, though not widely known setting.

At Alexian Brothers Hospital, 1200 W. Belden Ave., alcoholism is interpreted, explained and treated as both a physical and mental disease. Patients who enter the hospital's altherapy ward soon are taught that once the body chemistry changes so that it cannot assimilate alcohol, it is no longer safe at any time to introduce alcohol into one's system.

Patients entering the private 16-bed, all male ward are usually brought in by family or by members of Alcoholics Anonymous.

Each patient is assigned to a staff doctor or may request his own private physician.

During the first seven days, the patient receives a high caloric diet and high dosages of vitamins to help build him up. Consultation is available from the start. Emphasis is placed on the fact that alcoholism is a complex problem and each case is treated individually. Four days a week, group meetings are held. These nondirected sessions give patients an opportunity to discuss problems that they may have with alcohol.

One day a week a movie is shown on alcoholism, followed by a discussion. On Monday evening and Saturday morning, Alcoholics Anonymous conducts a meeting attended by both patients and others associated with the organization, including individuals who have overcome their problems.

Alkaptonuria

(Continued from page 685)

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Night Leg Cramps ... Unwelcome Bedfellow In Diabetes, Arthritis, and Peripheral Vascular Disorders²



now... specific therapy for night leg cramps

Walker

QUINAMM

Consistently effective, QUINAMM provided complete relief in 94% of 200 patients studied, many of whom were severe cases refractory to other medication.³ Your prescription for one tablet at bedtime often controls painful night cramps with the initial dose . . . helps restore restful sleep.



THE NATIONAL DRUG COMPANY DIVISION OF RICHARDSON MERRELL INC PHILADELPHIA, PENNSYLVANIA 19144 Prescribing Information: Composition: Each white, beveled, campressed tablet cantains: Quinine Sulfate 260 mg. and Aminaphylline 195 mg. Contraindication: QUINAMM is cantraindicated in pregnancy because af its quinine cantent. Precautions: Aminaphylline may praduce intestinal cramps in same instances, and quinine may praduce symptams af cinchanism, such as tinnitus, dizziness, and gastraintestinal disturbance. Discantinue use if ringing in the ears, deafness, skin rash, ar visual disturbances accur. Dosage: One tablet upan retiring. Where necessary, dasage may be increased to ane tablet fallowing the evening meal and ane tablet upan retiring. Supplied: Battles af 100 and 500 tablets. References: 1. Shuman, C.: Am. J. Med. Sci., 225:54, 1953.

2. Perchuk, E., et al.: Angialagy, 12:102, 1961. 3. Rawis, W., et al.: Med. Times, 87:818, 1959.

6/67 Q-706A

The Jewish Religion

(Editor's note: The following article, which outlines the precepts of the Jewish religion, is intended as an aid to those physicians who believe it important to understand the spiritual as well as the physical makeup of his patient. First published in the manual, "Religious Care for Hospital Patient," it is reprinted here through special permission of the author, Malcolm B. Ballinger, formerly chaplain and director of clinical pastoral training at the University of Michigan Medical Center, Ann Arbor.)

Groups: Organizationally, the Jewish religion is divided into three groups: orthodox, conservative, and reform. Orthodox Iews believe in the genuine divinity of the Five Books of Moses and the divine nature of the Oral Law which was given to Moses on Mt. Sinai and which was later written down in a series of vast volumes known as the Talmud. Reform Jews generally do not consider the Torah nor the Five Books of Moses to be divinely and directly given. Conservative Jews believe in the divinity of the Torah, but have relaxed several talmudic injunctions, restrictions and laws, although within the conservative movement there is wide latitude ranging from almost complete orthodoxy to almost complete reform.

tholy 10 (y): The major or high holy days are (1) New Year (Rosh Hashanah), (2) the first two and the last two days of Tabernacles (Succoth), (3) the first two and last two days of Passover (Pesach), (4) the two days of the Festival of Weeks (Shevouth), and (5) Day of Atonement (Yom Kippur). Observant Jewish people should be excused from duty on all these days wherever possible. Since these days are closely associated with home life, a special effort should be made to allow Jewish people to go home during these days. Minor holy days are (1) Hannukkah, (2) Purim, and (3)

the Fast of Ab (Tishah b'Ab). It is desirable that Jewish people be enabled to attend services on the eves of these holy days, but it is not necessary for them to be excused from duty.

Anniversary of Parent's Death: Each Jewish man with a deceased parent is individually obligated to participate in a service on the anniversary of the parent's death. The orthodox and conservative require ten persons to be present; among the orthodox these ten must be male and above the age of 13. Not all orthodox adhere to this, however. The reform group do not have such requirements.

Preparation for Death: It is the duty of the family of the Jewish patient to see that the Rabbi is summoned when there is danger of death, so that he may pray with the patient. From the moment the patient is in a dying condition he should not be left alone, in order that, as the Scriptures state, "his soul may not leave him while he is alone."

Sabbath: The Jewish sabbath begins at sundown Friday evening and ends at sundown Saturday evening.

Diet and Food Restrictions: Orthodox Jews, and in the main Conservative Jews, are forbidden to eat pork in any form and sea animals without scales, such as shrimp, lobsters, crabs, oysters, and clams. In addition they do not eat game, such as rabbits, squirrels, wild duck and quail. Their dietary laws demand that meat and various derivatives of meat, such as soups and gravies, should not be eaten at the same meal with dairy products, such as butter, cream, cheese, and milk. Eggs may be eaten at any meal if they are boiled, but if fried in butter they cannot be eaten with meat. The meat eaten by orthodox and conservative Jews is prepared in a special manner as prescribed by religious laws, and it is this special preparation which makes the

(Continued on page 757)



ALLERGY TO SEMINAL FLUID

Many stories have been told about the wife who is allergic to her husband and vice versa. In some instances sensitivity is caused by perfume, powder, mustache wax, or a fur coat. Occupational dusts brought home on the clothing of the man of the house may be the culprits. Human dander is mentioned occasionally as a cause of respiratory allergy and dermatitis. Such instances, however, are unusual and most complaints concerning allergy to one's mate are figments of the imagination or are misinterpretations.

Recently, B. N. Halpern and his colleagues¹ reported a rare case of acute anaphylaxis involving a young woman who was allergic to seminal fluid. Following her first sexual experience, she developed gen-

eralized urticaria with swelling of the lips, eyelids, tongue, and pharynx. In addition, there was a wheezing bronchitis and she had congestion of the mucous membranes along with violent pelvic pain with uterine contractions that culminated in loss of consciousness. Most of these symptoms recurred after every coitus. The attack reached a maximum intensity within 15 to 30 minutes and lasted 24 hours.

The anaphylactic response was due to the presence of reaginic antibodies in her serum directed against a normal mucoprotein in human seminal fluid. Desensitization treatment with seminal fluid was unsuccessful.

T. R. Van Dellen, M.D.

 Halpern, B.N.; Kay T., and Robert, B.: Immunology 12:247 (1967).

ARRESTING THE DECLINE OF RESEARCH IN PRIVATE PRACTICE

The decline of research in private practice has been commented upon by medical authorities. All but gone are the virtuosos of medicine who combined private practice with teaching and research.

Today the great majority of research is done by full-time research workers. Other than clinical evaluation of drugs, only a small fraction of studies are carried out in private practice. The doctor in practice often does his research work "bare-handed" without the benefit of large grants or expensive equipment.

Recently there has been the development of collaborative research by groups of practitioners and full-time investigators from medical centers on important clinical problems.

A model of this type has been successfully tried in England. Collaborative studies

(Continued on page 756)



One by one the family's downed Because the G.I. bug's around

Parepectolin for quick relief of acute diarrhea ... soothes colicky pain with paregoric*

... consolidates fluid stools with pectin

... adsorbs irritants with kaolin,

and protects intestinal mucosa

Whether it's a 24-hour "bug", a food problem, or simply nervousness and anxiety, Parepectolin will bring the diarrhea under control until etiology can be determined. In some cases, Parepectolin may be all the therapy necessary.

Parepectolin

Each fluid ounce of creamy white suspension contains:

*Paregoric (equivalent)(1.0 dram) 3.7 ml.

Contains opium (¼ grain) 15 mg. per fluid

warning: may be habit forming

Usual Adult Dose: One or two tablespoonfuls three times daily.

Usual Children's Dose: One or two teaspoonfuls three times daily.



WILLIAM H. RORER, INC. Fort Washington, Pa.

Editorial

(Continued from page 755)

have been done by nearly 700 members of the College of General Practice in their private practice for the past ten years. Records for each patient and every disease seen for a year were recorded. The data which was published by the Registrar General in Great Britain-provide the best information we have on what really is seen in private general practice. A similar pilot study has recently been reported by the Department of Medicine of the University of Kentucky College of Medicine.

Dr. Robert Haggerty of the Department of Pediatrics of the University of Rochester School of Medicine stated that a collaborative research project involving pediatricians in private practice and full-time teachers in university medical centers has proven

to be of definite value.

Dr. Haggerty observed that the doctors in private practice who have a strong interest in research collaborated effectively in the project. Private physicians needed outside secretarial assistance to record all observations. The teaching physicians and the private pediatric practitioner found it necessary to work closely to decide on which projects they should study.

There are several important advantages to collaborative research. In private practice medical problems can be studied on a broader and more representative population than in teaching hospitals. The natural history of most diseases can be best studied in private practice. Studies of private practice are extremely valuable to those agencies concerned with the improvement and more effective delivery of good medical care to the community. Faculty members who engage in research become more familiar with the realities and the problems of private practice and rid themselves of the "esotericism" which has often been directed at full-time investigators in universities. Similarly, collaborative research is a refreshing tonic for the tired pediatrician or the discouraged general practitioner.

We can conclude that "there is a treasure trove of research gold in the seemingly barren hills of private practice."

Harvey Kravitz, M.D.

Reference

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OBITUARIES

*Dr. Lucien E. Barryte, Chicago, died Sept. 29 at the age of 68 in Ravenswood Hospital where he had been on the staff for 43 years.

*Dr. R. R. Bobzin, Shipman, a practicing physician in Shipman for 50 years died Sept. 25 at the age of 91. He was a member

of the Fifty Year Club of ISMS.

*Dr. Ladislav V. Capek, Riverside, died Sept. 28 at the age of 81. He was on the staff of West Suburban Hospital, Oak Park. Dr. W. S. Carter, Peoria Heights, who was a physician in Trenton for 38 years, died Sept. 22 at the age of 72.

*Dr. George F. Dick, Palo Alto, Cal., who with his late wife, Dr. Gladys Henry Dick, developed the Dick vaccine for scarlet fever, died Oct. 11 at the age of 87. He and his physician-wife were credited with developing a skin test for scarlet fever susceptibility, a preventive immunization and development of an antitoxin. This won them the University of Edinburg Cameron Prize, and a nomination for a Nobel award and the University of Toronto Mickle prize. He was a former chairman of the University of Chicago department of medicine, and former head of the department of medicine at Rush Medical School.

*Dr. Aaron E. Kanter, Chicago, died Sept. 25 at the age of 74. A graduate of Rush Medical School and a lieutenant commander in the navy in World War I, he was a former member of the medical staffs of Mount Sinai, Presbyterian-St. Luke's and Cook County hospitals.

Dr. Arthur J. Legner, Leland, died Oct. 6 at the age of 83.

Dr. Menzie A. Marlowe, Chicago, died Oct. 10. She was a senior attending physician at South Chicago Hospital and was a member of the Polish Women's Alliance of America and Bronislava Society Group 388.

Dr. Roy Parry, Macomb, died Sept. 20 at the age of 81. He had practiced for over 40 years at Scranton, Iowa, before moving to Macomb in 1954. During World War II he was a lieutenant in the U.S. Army, and was a past commander of the American Legion Post at Scranton.

*Dr. Samuel Perlstein, Chicago, died Sept. 24 at the age of 83. He was professor emeritus in medicine at the University of Illinois and founder of the outpatient clinic at Grant Hospital.

*Dr. Katherine B. Luzader, a practicing physician in Greenville for nearly 60 years, died Sept. 26 at the age of 95. She was a member of the Illinois Academy of General Practice and the Fifty Year Club of ISMS, and was secretary of Bond County Medical Society.

Medicine & Religion

(Continued from page 748)

meat kosher. This preparation generally involves soaking meat for one-half hour and salting it for an hour in order that the blood might be removed. For Jews, the blood is a symbol of life and, as recorded in the Bible, they are not allowed to eat it.

When absolutely necessary on account of illness, a Jew may go contrary to these dietary laws. It is deemed that the saving of life and the preservation of health take precedence over all Jewish religious injunctions. However, every effort should be made to provide the Jewish patient with kosher food products that will meet both the hospital and religious standards. It is possible for most dietitians to obtain such kosher food products.

The Rite of Circumcision: According to all three groups, Circumcision is held on the eighth day of life (seven days after the birth date). Orthodox people insist on a Mohel (one duly appointed by Jewish law for this ritual). Conservatives will accept a doctor if the Rabbi says the blessings. The Reformed prefer the same as the Conservatives: they prefer a Rabbi to be present, but the Circumcision is valid even if it is done without blessings of clergy.

The Rite of Circumcision is a joyous event because it marks the entry of a potential citizen into the ranks of his forefathers. During the ceremony the Mohel and other male persons wear their hats because it is believed to be more respectful to the Lord to keep the head covered when praying or engaged in any religious activity. The event is celebrated by drinking wine which is used in connection with certain prayers. If the Rite is performed in the hospital, provision should be made for those present to have the privacy desired for the joyous festivities.

Jewish Religious Supplies used in ministering to religious needs can include the following: (1) Orthodox, Conservative and

(Continued on page 758)



for

- EMPHYSEMA
- ASTHMA
- CHRONIC BRONCHITIS
- BRONCHIECTASIS



Each tablet contains:

Potassium Iodide195 m	g.
Aminophylline130 m	g.
Phenobarbital, Caution: May be habit forming 21 m	g.
Ephedrine HCl	ġ.

FEDERAL LAW PROHIBITS
DISPENSING WITHOUT PRESCRIPTION

Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

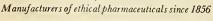
One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG—Formula, dosage and package identical to Mudrane—except—100 mg. glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

WM. P. POYTHRESS & CO., INC. RICHMOND, VIRGINIA 23217





New Products

Synalar-HP Cream, a high potency topical corticosteroid, is being introduced by the Pharmaceutical Division of Syntex Laboratories, according to Paul O. Bancroft, vice president and general manager.

Synalar-HP, containing 0.2% fluocinolone acetonide, has been shown to be an effective anti-inflammatory agent in dermatoses refractory to therapy with presently available topical corticosteroids. Some dermatoses that previously required systemic steroids have been responsive to therapy with Synalar-HP Cream. Synalar-HP will be supplied in 5 gm. tubes with a suggested price to retailers of \$3.60 per tube.

Mr. Bancroft announced that the new prescription product was to be available in pharmacies about Sept. 1.

Roche Laboratories, Division of Hoffmann-La Roche Inc., has introduced a concentrate form of Taractan (chlorprothixene).

Taractan (chlorprothixene) is a psychotherapeutic agent of proven value in moderate to severe emotional disorders. It is effective in the relief of agitation, anxiety, tension, confusion and related symptoms in psychotic and psychoneurotic patients.

The concentrate, containing 100 mg of the drug per 5 cc teaspoonful, is especially useful in treating psychiatric disorders requiring higher doses, i.e., severe neurotic and psychiatric states. Pleasantly fruit-flavored, the concentrate may be administered alone or in milk, water, fruit juices, coffee and carbonated beverages.

Taractan (chlorprothixene) Concentrate is available in bottles of 16 oz.

Medicine and Religion

(Continued from page 757)

Reform Prayer Books, (2) Prayer shawl and skull cap, (3) kosher sacramental wine and wine goblet (Kiddush cup), (4) Hebrew-English Bible (Old Testament only), (5) Menorah candelabra and candles, (6) electric Yahrzeit lamp and wax Yahrzeit candles, (7) set of phylacteries.

Autopsies: For the Orthodox Jew, tradition forbids an autopsy to be performed except where state law requires it or when an unnatural death has occurred. For the nonorthodox Jew, permission for an autopsy is an individual decision, based on conversation between the concerned relatives and their rabbi.

SOCIO ECONOMIC news

A service of the Public Relations and Economics Division

ISMS Committee
Ponders Professional
Liability Program

Look for these possible developments in the field of professional liability insurance: (1) a sharp increase in premium rates; (2) cancellation of many more policies; (3) a possible group malpractice insurance program sponsored by ISMS. The National Bureau of Casualty Underwriters—which represents most of the companies providing malpractice coverage—is calculating new premium rates because of record numbers of malpractice suits and high awards. The ISMS Medical Economics Committee reports that coverage of an increasing number of Illinois physicions is being cancelled. One major carrier told the committee that Illinois doctors need not fear being cancelled en masse, but



Do You Give Trading Stamps?

ISMS would Florida, Ne • A Gibson

it acknowledged that it had cancelled all Florida physicians. The committee has agreed that it should study the feasibility of a group malpractice insurance program which ISMS would sponsor. Similar programs are working in Florida, New Jersey, New York and Maryland.

Physicians Challenge Ruling On New Occupation Service Tax

A Gibson City physician, Dr. Paul Sunderland and ISMS have challenged a State Department of Revenue ruling that physicians must pay the new occupational service tax on drugs and medicines which they dispense. The Sangamon County Circuit Court issued a temporary injunction restraining the Revenue Department and the state attorney general from collecting the tax from doctors. Now, dispensing physicians face this problem until the court suit is decided: should they ignore the tax entirely, or should they pay it under protest? If they ignore it, and the court upholds the Revenue Department's ruling, they will have to pay the tax-plus interest and penalties-at a later time. If they choose to pay under protest, they must do the following: (1) obtain from the Revenue Department an account number in reference to the Service Occupation Tax Act; (2) file a monthly return showing the amount of tax due; (3) pay that amount; and (4) accompany each payment with a formal protest on a form approved by the department. If the temporary injunction is then made permanent taxes paid would eventually be refunded. This would mean the physician would also have to make a refund of the tax which he collected from patients.

Illinois Public Aid Polls Increase Again Illinois added 40,780 persons to its public aid rolls in the year ending last July. The Department of Public Aid said its payments for 438,412 recipients in July, 1967, totaled \$27,981,193, up from the \$24,806,359 paid in July, 1966.

Will-Grundy Doctors React To Public Aid Payment Program An improvement over the old fee schedule, but still short of expectations. That's the reaction of physicians in Will-Grundy County to the payment of usual and customary fees by the Illinois Department of Public Aid. A membership survey by the county medical society showed that 52 of 89 doctors feel the new program is "better" than the old. Seventeen believe the two programs are comparable, while 16 say the usual and customary fees plan is "worse" than the fee schedule. Only seven reported they had been paid the fee they billed. Twenty-five said IDPA had reduced "most" of their fees, 15 reported all their fees had been reduced, 29 said "some" were reduced and 10 said "only a few" fees were cut.

Seminar on Psychedelic Drugs Tested by ISMS Narcotics Committee

A pilot program to inform high school teachers about psychedelic drugs and narcotics has been developed by the ISMS Committee on Narcotics and Hazardous Substances. The four-part seminar is being tested this fall in five Chicago area high school districts. Success of the project will determine whether similar programs will be offered to other high schools. The first three seminar sessions deal with the physiology and pharmacology of drugs and the

sociological and legal aspects of drug usage. The fourth session is designed as a review period. Physicians presenting the programs include Dr. Joseph H. Skom, chairman of the ISMS committee; and Drs. Jerome Jaffe, David M. Slight, Daniel X. Freedman, Kermit Mehlinger and Merrel D. Flair. Circuit Court Judge Kenneth R. Wendt is also participating.

Keogh Retirement Act Permits Increased Deductions After January 1 Physicians and other self-employed persons will benefit from changes in the Keogh Self-Employment Retirement Act. Beginning January 1, 1968, a physician may deduct the entire amount of his contribution to his own retirement fund. Present law permits only half the contribution to be deducted for income tax purposes. In addition, doctors may contribute \$2,500 or 10 percent—whichever is greater—of his and his employees' earnings to a retirement program, provided this is done for all full-time employees with three years or more of service. All payments are deductible on the physician's tax return and are not currently taxable to himself or to any of his employees.

Children and Family Services Department Pays Usual Fees The Illinois Department of Children and Family Services is continuing to pay usual and customary fees to physicians for care of children under the Department's custody. Dr. J. Keller Mack, the department's medical and public health officer, told the ISMS Usual and Customary Fees Committee that doctors treating such children should bill the department unless the child is eligible for public aid. In such cases, the Illinois Department of Public Aid should be billed.

Hospital Medicine Audits Under Way by Illinois Blue Cross-Blue Shield Illinois Blue Cross-Blue Shield, the state's fiscal intermediary for Medicare, has contracted with two accounting firms to audit hospitals' statements of reimbursable costs. The audits—required by the Medicare law—are an extensive examination of a hospital's books, records and statistical data. The purpose? To provide information necessary for the carrier to express an opinion as to whether hospitals' reimbursable costs and other related data have been presented fairly in accordance with generally accepted accounting principles and Medicare regulations.

Urge Counties to Form Medicine-Religion Committees

Does your county medical society have a Committee on Religion and Medicine? If not, the ISMS Religion and Medicine Committee urges that one be appointed. The state committee believes its principal charge—to foster improved communications between doctors and clergy—cannot be met unless there is close liaison between the two groups at the local level.

Aged Patients Stay Longer In Illinois Hospitals

Patients 65 and over remain in Illinois hospitals 15.2 days—two days longer than the national average of 13.2 days. A survey among 656 hospitals by the American Hospital Association shows the length of stay for aged patients has increased from 11.2 days to 13.2 days since Medicare began.

----Marvin Schroder

MEETING MEMOS

Nov. 20—Following a 7 p.m. dinner the Chicago Society of Allergy will present a program including discussions on "Intractable Proxysmal Sneezing" (Dr. M. J. Kaplan) and "Induced Sequential Blood Blotting Patterns as an Indication of Non-reaginic Drug or Chemical Hypersensitivity" (Dr. E. Fisherman). Program to be presented at the Blair House Restaurant, 153 E. Erie St., Chicago.

Nov. 26-29—The 21st Annual Clinical Convention of the American Medical Association is to be held at the Astrohall, Houston, Texas. To be included on the program are scientific sessions, post graduate courses, and round table discussions on 26 subjects and areas. In conjunction with the convention, the National Conference on the Medical Aspects of Sports is scheduled for the Hotel Americana in Houston on Nov. 26. Utilization Review "Problems and Promise" is the theme of another concurrent meeting to be held at the Shamrock Hilton Nov. 25.

Nov. 27-30—The American College of Physicians will sponsor a four-day postgraduate course on medical genetics at the Medical Science Building, University of Michigan Medical Center, Ann Arbor.

Nov. 30—The Rehabilitation Institute of Chicago and the Ill. Section of the Physical Medicine and Rehabilitation of Mid-America will present the first lecture in the series of the Postgraduate Education Program on the topic "Clinical Indications and Value of Electromyography and Other Electrodiagnostic Testing."

Dec. 1, 8 and 15—Mount Sinai Hospital's Clinical Pathological Conferences, Chicago.

Dec. 2-7—The American Academy of Dermatology will meet at the Palmer House, Chicago.

Dec. 3-5—The Annual Meeting of the American Society of Hematology will be held in Toronto, Canada.

Dec. 4-7—The fourth annual Postgraduate Course on Pulmonary Function in Health and Disease will be held in New Orleans, La., in the Louisiana State University School of Medicine. Sponsored by the American Thoracic Society, Tulane University School of Medicine, Louisiana

State School of Medicine, Alton Ochsner Medical Foundation and the Louisiana State Thoracic Society. The course will include The Mechanics of Breathing, Clinical Spirometry, Alveolar Ventilation, Distribution of Gases, Office Pulmonary Function Testing, Pulmonary Diffusion, Ventilation—Perfusion Relationships, Pulmonary Function in Children, Cor Pulmanale-Circulation, Acid-Base Problems, and case presentation and demonstrations.

Dec. 4, 11 and 18—Mount Sinai Hospital's Medical Lecture Series, Chicago.

Dec. 6—The Barren Foundation will present a seminar on "Induction of Ovulation" at Wesley Memorial Hospital, Chicago. The program is partially supported by grants from pharmaceutical houses Wm. S. Merrell Co. and Cutter Laboratories.

Dec. 6-Mount Sinai Hospital's Medical Grand Rounds on "Renal Manifestations of Collagen Diseases," Chicago.

Dec. 6-7—A postgraduate course in Ophthalmology is being offered by the Cleveland Clinic Educational Foundation, Cleveland, Ohio.

Dec. 13—The University of Chicago Hospitals and Clinics Committee on Continuing Education will present a day-long series of presentations on "Shock." Topics include The Definition of Schock and Its Patho-physiology, Shock as a Disease of the Kidneys, Impact of Failing Circulation on Pulmonary Function, On the Heart as a Pump and Its Role in the Syndrome of Shock, and Management of Shock, among others. Coordinator is René Menguy. Advance registration is desirable.

Dec. 13—Mount Sinai Hospital's Medical Grand Rounds on "Hypercholesterolemias," and Surgical Journal Club on "Patho-physiology of the Stomach," Chicago.

Dec. 15-17—The American Psychoanalytic Association will be meeting at the Waldorf-Astoria Hotel, New York.

Dec. 20—Mount Sinai Hospital's Medical Grand Rounds on "Dysproteinemia," and Surgical Journal Club on "Common Duct Surgery," Chicago.

Dec. 27—Mount Sinai Hospital's Medical Grand Rounds on "Pulmonary Edema," and Surgical Journal Club on "Gastrointestinal Tract," Chicago.

STATEMENT OF OWNERSHIP, MANAGEMENT AND CIRCULATION (Act of October 23, 1962: Section 4369, Title 39, United States Code)

1. Date of filing: October 31, 1967.

2. Title of publication: Illinois Medical Journal.

3. Frequency of issue: Monthly.

4. Location of known office of publication: 360 North Michigan Avenue, Chicago, Illinois 60601.

 Location of the headquarters or general business offices of the publishers (Not printers): 360 North Michigan Avenue, Chicago, Illinois 60601.

6. Names and addresses of publisher, editor, and managing editor: Publisher: Illinois State Medical Society, 360 North Michigan Are., Chicago, Illinois 60601. Editor: T. R. Van Dellen, M.D., 360 North Michigan Avenue, Chicago, Illinois 60601. Managing editor: John A. Kinney, 360 North Michigan Avenue, Chicago, Illinois 60601.

A. Kinney, soo North michigan Avenue, Chicago, Illinois 80001.

7. Owner (If owned by a corporation, its name and address must be stated and also immediately thereunder the names and addresses of stockholders owning or holding 1 percent or more of total amount of stock. If not owned by a corporation, the names and addresses of the individual owners must be given. If owned by a partnership or other unincorporated firm, its name and address, as well as that of each individual must be given.) Name: Illinois State Medical Society. Address: 360 N. Michigan Avenue, Chicago, Illinois 66601

8. Known bondholders, mortgagees, and other security holders owning or holding 1 percent or more of total amount of bonds, mortgages or other securities (If there are none, so state): None.

9. Paragraphs 7 and 8 include, in cases where the stockholder or security holder appears upon the books of the company as trustee or in any other fiduciary relation, the name of the person or corporation for whom such trustee is acting, also the statements in the two paragraphs show the affiant's full knowledge and belief as to the circumstances and conditions under which stockholders and security holders who do not appear upon the books

of the company as trustees, hold stock and securities in a capacity other than that of a bona fide owner. Names and addresses of individuals who are stockholders of a corporation which itself is a stockholder or holder of bonds, mortgages or other securities of the publishing corporation have been included in paragraphs 7 and 8 when the interests of such individuals are equivalent to 1 percent or more of the total amount of the stock or securities of the publishing corporation.

10. This item must be completed for all publications except those which do not earry advertising other than the publisher's own and which are named in sections 132.231, 132.232, and 132.233, postal manual (Sections 4355a, 4355b, and 4356 of Title 39, United States Code)

	Average No.	
	copies each	
		Single issue
	preceding	nearest to
	12 months	filing date
A. Total no. copies printed		
(Net press run)	12,300	12,900 (Oct. '67)
B. Paid Circulation		
1. Sales through dealers and		
carriers, street vendors an	d	
counter sales	none	none
2. Mail subscriptions	11,078	11,158
C. Total paid circulation	11,078	11,158
D. Free distribution (including		
samples) by mail, carrier or		
other means	725	747
E. Total distribution (Sum of C		
and D)	11,803	11,905
F. Office use, left-over, unac-		
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North Shore Hospital, a 65-year-old psychiatric facility located on Lake Michigan in Winnetka, Illinois, is an intensive care hospital.

An open staff institution, it provides, through its house and attending staff, a total range of psychotherapies and those related activities which round out a comprehensive treatment program.

A new Half Way Hall, situated in the hospital, has been opened to provide relative freedom of movement in an environment designed to stimulate recovery and provide a necessary phase of interim residence.

A completely open section is a fea-ture of North Shore Hospital's residential plan.

An adolescent program offers boys and girls of high school age a closelystructured program of daily care, with daily classroom attendance and individual tutoring emphasized.

The adjunctive therapies are manned by certified personnel. Occupational and recreational activities not only help structure the patient's day, but offer creative programs in which patients participate according to their emotional health and native capacity.

A therapeutic education program has been introduced for all patients. Medicare patients are offered special attention and remotivation activities.

Psychiatric testing and evaluation is offered, as is individual and group therapy, chemotherapy and the traditional modalities employed in the treatment of emotional illness.

In reputation, performance and location, North Shore Hospital is the psychiatric hospital of choice.



For information, contact: CHARLES H. JONES, M.D. Superintendent & Psychiatrist in Chief Telephone: 312-446-8440 225 Sheridan Road, Winnetka, Illinois (Write for Brochure)

NEW PHARMACEUTICAL SPECIALTIES

by Paul deHaen

For detailed information regarding indications, dosage, contraindications and adverse reactions, refer to the manufacturer's package insert or brochure

Single Chemicals-Drugs not previously known, including new salts.

Duplicate Single Products—Drugs marketed by more than one manufacturer.

Combination Products—Drugs consisting of two

or more active ingredients.

New Dosage Forms-Of a previously introduced product.

NEW SINGLE CHEMICALS

ALCOPARA Anthelmintic \mathbf{R} Manufacturer: Burroughs Wellcome & Co.

Nonproprietary Name: Bephenium hydroxynaphthoate

Indications: Hookworm infections, and roundworm infections when they occur concomitantly with hookworm infestations.

Contraindications: None mentioned. Dosage: 5 Gm. twice daily for 1-3 days. Children under 50 lbs.—one-half above dose. Supplied: Foil packets—5 Gm.; envelopes of two.

DUPLICATE SINGLE PRODUCTS

 \mathbf{R}

 \mathbf{R}

LMD 10% Hospital Solution Manufacturer: Abbott Laboratories Nonproprietary Name: Dextran 40

Indications: Priming fluid in pump-oxygenators for perfusion during extra-corporeal circulation

Contraindications: Thrombocytopenia, hypofibrinogenemia, and renal disease with severe oliguria or anuria.

Dosage: 1 to 2 Gm./k. body weight added to perfusion circuit.

Supplied: Sterile containers-500 cc., with 4.5 Gm. sodium chloride or 25 Gm. dextrose.

COMBINATION PRODUCTS

ARALEN w/PRIMAQUINE Antimalarial Manufacturer: Winthrop Laboratories Composition:

500 mg. Chloroquine phosphate Primaquine phosphate Indications: Malaria prophylaxis only 79 mg.

Contraindications: Acutely ill patients suffering from systemic disease manifested by tendency to granulocytopenia (e.g. rheumatoid arthritis, lupus erythematosus). Patients receiving concurrently other potentially hemolytic drugs or depressants of myeloid elements of the bone marrow. Patients who have received quinacrine recently.

Dosage: Adults-one tablet weekly, starting the day before entering malarious area and con-tinuing for six weeks after leaving it. Children-dose schedule formulated on basis

of weight. Supplied: Tablets—bottles of 100. (Continued on page 766)

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SPECIALTY REVIEW COURSE IN SURGERY, PART II, De-PECIALTY REVIEW COURSE IN MEDICINE, Part II, November 27

vember 2/ SPECIALTY REVIEW COURSE IN UROLOGY, November 13 SPECIALTY REVIEW COURSE IN RADIOLOGY, November 13 SPECIALTY REVIEW COURSE IN ORTHOPEDICS, December 11 SPECIALTY REVIEW COURSE IN PEDIATRICS, December 4 PATHOLOGY REVIEW COURSES FOR SPECIALTIES, Request

Dates
SURGERY OF COLON & RECTUM, One Week, November 13
MANAGEMENT OF COMMON FRACTURES, One Week, November 13

vember 13
PROCTOSCOPY & VARICOSE VEINS, One Week, December 11
BREAST AND THYROID SURGERY, One Week, November 27
SYMPOSIUM ON SHOCK, Two Days, December 15
VAGINAL APPROACH TO PELVIC SURGERY, One Week, December 11

Cember 11 GYNECOLOGY, Office & Operative, One Week, November 13 OBSTETRICS, General & Surgical, One Week, November 6 BASIC INTERNAL MEDICINE, One Week, November 13 ANESTHESIA, Inhalation, Endotracheal, Regional, Request

Information concerning numerous other continuation courses available upon request.

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Think small. If you save one person from hunger, you work a miracle. Give to CARE, New York 10016

New Pharmaceutical Specialties

(Continued from page 764)

CORICIDIN DEMILETS Cold Preparation-

General o-t-c

Manufacturer: Schering Corporation

Composition: Chlorpheniramine maleate 0.5 mg. Phenylephrine HC1 2.5 mg. Aspirin 80.0 mg.

Indications: Symptomatic relief of the common cold in children.

Contraindications: None mentioned.

Dosage: As indicated.

Supplied: Chewable tablets, orange-pineapple flavored; packages of 24.

COMBINATION PRODUCTS

CHERACOL CAPSULES Cold Preparation-

o-t-c General

Manufacturer: The Upjohn Co. Composition:

Chlorpheniramine maleate 2.0 mg. Methoxyphenamine HC1 25.0 mg. Aspirin 324.0 mg.

Caffeine 32.4 mg. Indications: Temporary relief of symptoms due to the common cold.

Contraindications: None mentioned.

Dosage: One capsule q. 4h. Not more than 4 capsules/24 hours.

Supplied: Capsules—packages of 24.

NEW DOSAGE FORMS

DECLOSTATIN Antibiotic—B & M

Spectrum Manufacturer: Lederle Laboratories

 \mathbf{R}

Composition: Demethylchlortetracycline HC1 300 mg. Nystatin 500,000 U.

Indications: Intestinal moniliasis, infections caused by organisms sensitive to tetracyclines. Contraindications: History of hypersensitivity to either of its ingredients.

Dosage: 1 tablet twice daily for up to 15 days. Supplied: Tablets—bottles of 12 and 48.

HEXADROL CREAM Corticoid—Local

Manufacturer: Organon Inc.

Nonproprietary Name: Dexamethasone Indications: Contact dermatitis, seborrheic dermatitis, atopic dermatitis, and neurodermatitis.

Contraindications: Tuberculosis of the skin, and

most viral skin infections.

Dosage: Apply lightly to affected area three or four times daily.

Supplied: Tubes-0.04%; 10 or 30 Gm.

"Seven Paths to Fitness" is the title of a new 10-page AMA pamphlet outlining key steps toward maintaining or building good health.

The seven paths described, each covered in simple outline form, are medical care, nutrition, dental services, exercise, satisfying work, recreation and rest and relaxa-

Available from the AMA Order Department, single copies are 10 cents. Copies are eight cents when ordered in quantities of 100 to 499.

BLUE SHIELD REPORT FOR Illinois Physicians

PUBLISHED MONTHLY BY: BLUE SHIELD PLAN OF ILLINOIS MEDICAL SERVICE • 425 NORTH MICHIGAN AVENUE • CHICAGO, ILLINOIS 6069

Vol. I No. 3 DECEMBER, 1967

MA House Commends Board For Choosing Blue Cross-Blue Shie



AMA HOUSE OF DELEGATES, HOUSTON, TEXAS

The AMA's House of Delegates, at the Houston meeting, commended the Board of Trustees and officers of AMA for selecting the Blue Cross-Blue Shield plan for its 950 employees.

The Blue Shield Plan of Illinois Medical Service and Illinois Blue Cross cover a broad scope of benefits for AMA employees. Blue Shield pays 80% of the physician's usual & customary charges and the employee pays 20%.

The House action was taken on a resolution introduced by the Indiana delegation. The resolution stated in part that "Blue Cross and Blue Shield have constantly improved their own flexibility to provide quality care in a manner satisfactory to both employers and the providers of service." It further stated that "the Blue Shield plans of this country have been one of medicine's closest partners, standing with the Association over the years for the advancement of free enterprise of medical practices in America."

The House also was in full accord with a resolution introduced by the Wisconsin delegation which "Resolved, That medical society officers and medical society executives be urged to participate in the activities of their respectively sponsored or approved plans to the end that all such plans shall, in fact, be and continue to serve as economic arms of the medical profession in offering sound alternatives to the public in the voluntary financing of health care."

In Hospital Medical Care

Benefits are provided under most Blue Shield Certificates for medical care rendered when the patient is hospitalized. Allowances vary in accordance with the type of Blue Shield Certificate held by the member.

Admission date, discharge date, diagnosis and the number of in-hospital daily visits made must be reported before claims can be paid.

To avoid returning reports for additional information which delays payment, it is essential that the questions on Blue Shield's Physician's Service Report, "Was surgery also performed?" be answered, and "If so, by whom?", even if all services performed were medical (nonsurgical).

Medical care rendered concurrently with surgical or obstetrical care during a period of hospitalization is not usually a covered benefit. However, in unusual instances, if the medical care is essential to and distinct from the usual pre-operative and post-operative care, a detailed report from the physician rendering medical care, describing in full the nature of his services, should be submitted for consideration.

When two or more physicians render "active and continuous" medical care during a period of hospitalization, each physician submitting a report to Blue Shield should name the other physicians associated on the case. This does not include consultations. No Illinois Blue Shield Certificate provides payment for this service.

(This is not an advertisement)

ASK BLUE SHIELD

Q Why is it necessary to describe the location, length, and depth of a laceration?

A Individual consideration is given to dctermine benefits for lacerations based upon these factors.

O Why are service reports returned when the

place of service is not indicated?

A Blue Shield must know the place of service, In-Hospital, Out-Patient, Hospital, Office, in order to determine the Blue Shield Benefit.

Q If a patient has the "Series 65" Major Medical Plan, will Bluc Shield pay the \$50 Medicare deductible?

A The Major Medical Plan can pay 80% of the \$50 Medicare deductible provided the \$100 Major Medical annual deductible has been satisfied.

O What charges may be applied to the Major Medical \$100 annual deductible?

A The \$40 Part A and the \$50 Part B deductibles and \$10 paid toward co-insurance can be applied to the \$100 Major Medical deductible; or, when a patient has major health care bills and has paid at least \$100 in co-insurance, our "Series 65" Major Medical Plan will pay 80% of the member's Medicare deductibles.

Q Why haven't I received payment from Blue Shield on a patient who has your "Series 65" Major Medical Plan? I have filed a Physician's Service Report.

A We checked the file of your patient and discovered that his bill amounted to \$150. Medicare paid \$80 after the \$50 deductible. Your patient's charges totaled \$70 (\$50 deductible plus \$20 coinsurance) which are less than the \$100 deductible. Consequently, no benefits were payable.

ABOUT MEDICARE

Q Are cataract eyeglasses paid for under Medi-

A Yes. Lenses which replace an internal body organ (the crystalline lens of the eye) are prosthetic devices rather than "eyeglasses". Eyeglasses are specifically excluded from coverage by the law.

Q Will Medicare pay for more than one pair of prosthetic lenses?

A It will pay for more than one pair under certain conditions. Prosthetic lenses that are necessary because of a change in prescription are covered. Also, those combinations of prosthetic lenses necessary to restore vision provided by the crystalline lens of the eye. Therefore, payment could be made for (1) a cataract lens and prosthetic lenses in frames or (2) bifocal spectacles or (3) prosthetic lenses in separate frames (far vision and near vision).

Q Are charges for whole blood ever covered under Part B?

A Yes. Whole blood is a biological which cannot be self-administered and is covered when provided as an incident to a physician's services. Thus, if a physician administers (or personally supervises administration of) a transfusion and includes the expenses for the blood in the bill for his professional services, or if a participating hospital furnishes blood in connection with physicians' services to outpatients, the blood is reimbursable under Part B.

Q Are insulin shots that I administer to my blind or emotionally disturbed patients covered by Part

A No. Insulin injections received regularly by a diabetic to maintain the proper blood sugar level are commonly self-administered and therefore excluded from coverage. The exclusion is related to the type of injection given. The exclusion of insulin injections does not apply to such injections given as part of emergency treatment such as diabetic coma.

Q Are influenza inoculations for beneficiaries a covered expense?

A No. Immunizations are specifically excluded by the law.

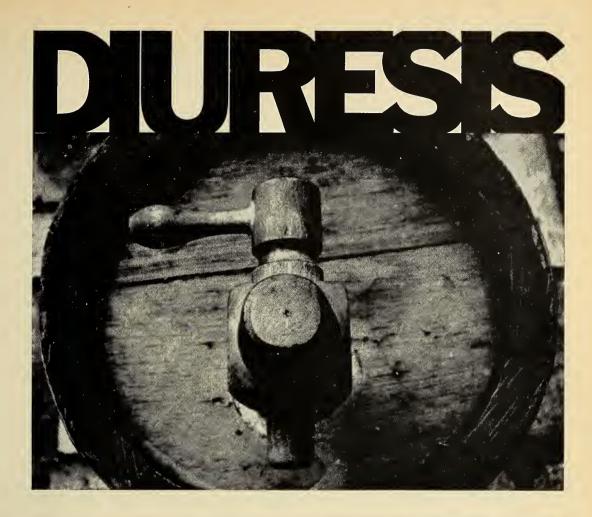
Q Does Part B cover the charge for nonselfadministerable drugs, such as allergy serum, which the patient purchases and brings to my office for an injection?

A No. To be covered, the nonself-administerable drug must be furnished by the physician who administers it and included in his bill.

Our Government Contracts Division

reports that Federal Health Insurance benefits under Title XVIII, Part B of P.L. 89-97 were paid during October for over 40,000 cases in the counties of Cook, DuPage, Kane, Lake, and Will for an amount exceeding \$2,000,000. For the year 1967 through October, payments have been made on over 404,000 cases for an amount exceeding \$24,000,000.

The number of cases processed in October under Part A exceeded 73,000 with payments to providers amounting to more than \$21,000,000. For the year 1967 through October over 483,000 cases have been processed and payments to providers have exceeded \$149,000,000.



MERCUHYDRIN

(meralluride injection)



Twenty years ago the publication of "A System for the Routine Treatment of the Failing Heart" 1 established a schedule of diuretic therapy as a primary factor in the treatment of acute congestive failure. With emphasis upon daily injections of Mercuhydrin (meralluride injection) until dry weight was obtained, Gold, et al. achieved a 40% increase in improvement, in ½ the time, over other methods then current. Today, most medical texts continue to recommend parenteral mercurials in acute congestive failure when prompt diuresis is indicated.

Recently Modell² has stated: "The mercurial diuretics are the injectable diuretics of choice since they are the most potent as well as the most dependable. Their toxicity is not an important consideration either by comparison with other potent diuretics or in relation to the seriousness of the conditions in which they provide such excellent relief."

IN BRIEF

Mercuhydrin is indicated in edema of cardiac or hepatic origin and in the nephrotic syndrome; it is contraindicated in acute nephritis and in anuric or oliguric states. The usual adult dose is one to two cc. daily or every other day until "dry weight" is obtained. Sensitivity is rare but small initial doses are advised to minimize potential reactions; vertigo, fever, and rash have occurred. Overdosage may produce electrolyte depletion, muscle cramps, and G.I. reactions. Supplied: 1 cc. and 2 cc. ampuls in boxes of 12, 25 and 100; 10 cc. rubber capped, multiple-dose vials (intramuscular or subcutaneous use only) in boxes of 6 and 100.

- 1.Gold, Harry, et al.: A System for the Routine Treatment of the Failing Heart, The American Journal of Medicine, Vol. III, No. 6:665-692 (Dec.) 1956.
- 2. Modell, Walter: *Drugs of Choice 1966-1967*, p. 97, 1966.

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Illinois Medical Journal

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WHEN ANXIETY IS A SIGNIFICANT COMPONENT OF THE CLINICAL PROFILE

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The president's page



Newton DuPuy, M.D.

Physicians of Illinois have an opportunity to avail themselves of a "group insurance policy" which contains professional, economic and social benefits. I urge all members to "purchase" this policy and join with the physicians of Illinois who are already doing their part to preserve quality medical care and promote good government for all of our citizens. The insurance policy is called IMPAC (Illinois Medical Political Action Committee) and I appeal to you at this time to honor the voluntary assessment on your 1968 dues billing which makes you a member of IMPAC/AMPAC.

Why IMPAC Exists?

IMPAC, the fore-runner of AMPAC and the PAC movements in the other 49 states, was established to enable medicine to exert the political influence to which it is entitled and to provide leadership in the field of civic responsibility. Active citizen participation is the keystone of good government.

Virtually every other group or interest has developed a political action arm which supports its friends at campaign time. For example, Members of Congress and candidates who support the aims of organized labor (such as Medicare) can count on massive help from COPE, the AFL Committee on Political Education and other union political groups. A single dinner last month netted over \$90,000 for political action purposes on behalf of a labor group!

Until the establishment of the PAC movements, political friends of medicine had no similar organization to which they

could turn for support. The great political influence exerted by organized labor, the pharmaceutical associations, manufacturing interests, retailing and other interests throughout the country rests on their power at the polls and with their pocket-books.

All political officeholders, national, state and local recognize this power. Medicine *must* be able to be active and compete if representative government is to be preserved. Medicine has the political potential with its manpower and money to provide this much needed counter balance.

It is IMPAC's philosophy that government must be truly representative of all people to protect the principles we espouse in medicine. We must gird for battle against further erosions of our professional freedom and make certain no single group or interest is in a position to dominate the electorial processes.

In the 1966 elections, IMPAC provided candidate-support to almost 200 candidates and was successful in over 90 percent of these contests. This included the election of a Congressman who will strongly support the ideals of medicine and, at the same time. IMPAC helped retire the "Medicare voter" from that same district. Medicine demonstrated in 1966 that it, too, is willing and able to provide help for its political friends. As a result, our posture in the legislative halls of Washington and Springfield has been greatly improved. But the challenge is a continuing one. We cannot afford to merely be "election-day citizens."

(Continued on page 842)

Abstracts of Board Actions

October 21-22, 1967

BOARD TO STUDY PHYSICIAN ENLISTMENT

The Executive Committee of the Illinois State Medical Society is studying the problem of physician essentiality and military draft or enlistment. Physicians may now enlist for a period of four years or be drafted for two years of service. It has been suggested that the Board of Trustees recommend to proper authorities that the enlistment term be shortened.

COUNTIES ASKED TO NAME DELEGATES

Dr. Maurice Hoeltgen, Speaker of the ISMS House of Delegates, is requesting that county societies name their delegates to the 1968 House and submit their names as soon as possible so that they can be published and reference committees appointed.

DR. BORNEMEIER'S AMA CANDIDACY ANNOUNCED

The Board of Trustees has unanimously endorsed the candidacy of Dr. Walter C. Bornemeier for president-elect of the American Medical Association in 1969.

RELATIONS WITH OSTEOPATHS

On recommendation of the ISMS Policy Committee, the Board of Trustees has endorsed the AMA statement regarding the ethics of association with osteopaths: "Voluntary professional association with a Doctor of Osteopathy are not deemed unethical if the Doctor of Osteopathy bases his practice on the same scientific principles as those adhered to by members of the AMA, and if he is licensed to practice medicine and surgery in all its branches in Illinois." The ISMS House of Delegates will be asked to take similar action.

TELEVISION SERIES ON PRE-RETIREMENT PLANNING

A 13 part television series, to be produced by the ISMS Committee on Aging, has been approved by the Board of Trustees, provided the necessary financial support can be obtained. (Blue Shield will co-sponsor this series and furnish the necessary financial support.)

NEW MEDICAL SCHOOLS

The Council on Medical Education has been asked to assume the leadership in providing medical education of high quality for as many students as possible in order to increase the number of physicians. The recommendation followed action by the Board encouraging establishment of additional medical schools in Illinois, as requested by the House of Delegates.

for December, 1967

GROUP LIABILITY COVERAGE STUDIED

The Committee on Medical Economics and Insurance has been given authority to study the possibility of obtaining group liability insurance for members of the Illinois State Medical Society.

Since the 1967 Illinois Legislature removed a \$30,000 limitation on the amounts which can be recovered in a wrongful death suit, there has been a trend toward cancelling the malpractice liability insurance of older physicians and those against whom nuisance suits have been filed. Legal Counsel Frank M. Pfeifer has suggested that it might be possible for ISMS to set up a separate corporation to issue group liability policies that would be non-cancellable and would carry no dollar limit. He has been asked to study this, recommend to the Board what steps might be taken and to prepare an article on the subject for the Illinois Medical Journal.

USE OF EXTERNS IN ACCREDITED HOSPITALS

Three members of the Board recently appeared before the Joint Commission on Accreditation of Hospitals to request that the rule prohibiting use of externs in hospitals be relaxed, but the Commission failed to take any action on the request. The request now goes to the AMA House of Delegates in the form of a resolution from the Chicago Medical Society which has been approved by the ISMS Board of Trustees. When it became known that one of the Illinois nominees for a position on the Joint Commission was not a member of the Illinois State Medical Society, the ISMS Board announced it would work for representation by practicing physicians.

PRESIDENTIAL TOUR

The Board expressed its gratitude to President DuPuy and President-Elect Thomsen for their tour of the State on behalf of organized medicine. According to Public Relations Director Jim Slawny, the tour as of Mid-October had resulted in \$10,000 in free newspaper coverage plus goodwill developed with members, service clubs and news media.



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"When I couldn't even smell corned beef and cabbage, I decided it was time for you, Doc."



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Pediatric Cardiology (Congenital Heart Disease)

By ROGER B. COLE, M.D. AND MILTON H. PAUL, M.D./ CHICAGO

A continuing reappraisal of progress and goals is essential in all of medicine but particularly in so dynamic a specialty as pediatric cardiology. Advances in diagnostic, surgical and life prolonging physiological support techniques have made common surgical procedures not deemed feasible 10 years ago. In major cardiovascular centers, the operative mortality for most uncomplicated congenital heart malformations is less than one or two percent, and ingenious palliative procedures are available even for the most complex malformations. These results, however, largely represent success in infants and children over the age of one year. Mortality, both with and without operation, in the new born period remains quite high. Approximately one third of the infants born with

congenital cardiac defects die in the first month of life, and about one half of the neonatal deaths occur during the first week of life.^{2, 3} In this review, therefore, we have emphasized general concepts and specific therapeutic developments which are concerned with the management of the young infant with congenital heart disease.

The pediatrician or family physician may feel intimidated by the emergence of the new subspecialty of pediatric cardiology. This family physician, however, is the key man in the detection of cardiac defects. Furthermore, because he has the confidence of the parents and child, he must assist in guiding them to an informed consent, if surgery is indicated, and help care for the patient on a day to day basis.

I MEDICAL CONSIDERATIONS

Etiology of Congenital Heart Disease

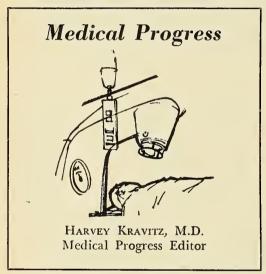
There seems little doubt that this coming decade will greatly expand our understanding of the possible genetic, metabolic and environmental components of congenital heart disease. Examples of gross chromosomal effects on the cardiovascular system continue to be reported, often with a dominant associated cardiac malformation. These include mongolism,⁴ (trisomy 21-22) with atrio-ventricular canal defects or ventricular septal defect; D-1 syndrome⁵ (trisomy 13-15) with ventricular septal de-

fects commonly; E-syndrome⁵ (trisomy 18) with ventricular septal defects commonly; Turner's syndrome⁶ (sex chromosome abnormality) with coarctation of the aorta or pulmonary stenosis occurring commonly. Four congenital heart lesions have been described on the basis of large family pedigrees as probable single gene mutants;⁷ supravalvular aortic stenosis, subaortic

From the Division of Cardiology, The Willis J. Potts Children's Heart Center, The Children's Memorial Hospital, and the Department of Pediatrics Northwestern University Medical School.

stenosis, familial myocardiopathy and endocardial fibroelastosis, but there are nonfamilial cases of these same lesions probably having a different etiology. Investigations of families selected through a proband having a congenital heart malformation indicate recurrence figures of 1.5 to 3.5 per cent,⁸ a risk significantly greater than that in the general population (0.5 to 0.8 per cent).

Chromosomal or known genetic abnormalities, nevertheless, account for but a few percent and in about 96 percent of all congenital heart malformations, the etiology is unknown. The viral pathogenesis of congenital heart malformations con-



tinues to be a most important area for study. The 1964 rubella epidemic provided an avalanche of important viral and clinical studies culminating in a description of congenital rubella in the neonate,9 characterized by growth retardation (placental insufficiency syndrome), congenital cardiac defects (usually patent ductus arteriosus and pulmonary stenosis) and ocular defects (cataracts, micropthalmia, glaucoma). There has also been the description of an "expanded" rubella syndrome with thrombocytopenic purpura and enlargement of the liver and spleen, roentgenographic abnormalities in the long bones of the extremities, a myocarditis syndrome and demonstration of prolonged excretion of viable rubella virus.10

Other clinical embryopathic relationships between virus and congenital heart malformations continue to be explored and center about possible associations of of group B coxsackie virus¹¹ and mumps virus¹² with primary endocardial fibroelastosis.

These observations on viral related defects and the thalidomide cardiac malformation tradegy of recent years reinforce the need for increasing efforts in the areas of etiologic and pathogenetic research as contrasted to diagnostic and therapeutic research.

The initiation of mass epidemiologic studies may shed some light on etiologic factors and several new techniques have facilitated these studies. Tape recording of heart sounds¹³ was shown to be an effective and efficient method for screening grade school and high school students for possible heart disease, and subsequently, an electronic analog-computer device¹⁴ was introduced for mass screening purposes.

Diagnostic Techniques

Specific and detailed anatomic and physiologic diagnosis can be achieved in the infant without undue morbidity or mortality as a result of the perfection of a number of techniques15 and the development of highly skilled physicians specializing in this area. A complete nontraumatic catheter exploration plus an adequate angiocardiographic study are essential. It has been found important to maintain the core temperature of newborn and critically ill infants undergoing cardiac catheterization,16 and it is advisable to replace significant amounts of blood withdrawn for diagnostic purposes and to correct significant metabolic acidosis.

A neonatal syndrome characterized by transient plethora, cyanosis and mild cardiorespiratory symptoms has been further documented.¹⁷ A search for pathogenetic factors in these infants revealed considerable elevation in hematocrit and hemoglobin levels consistent with a transient neonatal polycythemia. This may in part be related to an excessive placental-fetal transfusion. Spontaneous improvement is common but when respiratory distress remains excessive, phlebotomy with fluid replacement therapy is indicated. Of considerable importance is the suggested evidence linking neurologic sequelae in some of these infants with polycythemia and high blood viscosity.

Electrocardiography, ^{18, 19} vectorcardiography, ²⁰ phonocardiography^{21, 22} a n d

angiocardiography continue to be applied widely and intensively to congenital heart disease diagnosis. Several comprehensive texts concerned exclusively with pediatric cardiology have been recently published.^{23, 24, 25}

Metabolic Acidosis

The immediate pre- and postoperative management of cyanotic infants has been considerably improved by the recognition that rather severe metabolic acidosis may occur in these infants.²⁶ Arterial blood pH levels of 7.00 to 7.20 are observed and cardiac function may be profoundly depressed by the acidosis. Frequent determinations of blood pH and PCO₂ in the critically ill infant with subsequent correction by sodium bicarbonate or tris buffer will result in an improved operative salvage.

Hyperbaric Oxygen

The recent clinical application of hy-

perbaric oxygen techniques to increase the partial pressure of oxygen in the circulating arterial blood appear to represent a significant contribution to the therapy of congenital heart disease under certain specific conditions.27 Early studies suggest that the success of surgical management of extremely hypoxic infants can be improved by the use of hyperbaric oxygen. Infants with severe pulmonary edema (e.g. ventricular septal defect with massive left to right shunt, critical aortic stenosis) or with extreme anoxemia (e.g., tetralogy of Fallot with pulmonary atresia, transposition of the great arteries) are primary candidates for this supportive aid. Hyperbaric oxygen techniques are no panacea and cannot substitute for skilled medical and surgical management. In addition, the installation and maintenance of large hyperbaric tanks and ancillary equipment involve considerable space and expense and represent significant safety problems.

II SURGICAL CONSIDERATIONS

The pediatrician, cardiologist and surgeon must be prepared to interrelate the *natural history* of a specific lesion (i.e., the life expectancy and the anticipated complications without surgery) with: (1) the *current surgical risk* (mortality and morbidity) as it applies to a specific surgical procedure performed by a specific surgeon in a specific institution, and (2) the *anticipated benefit* from the palliative or corrective surgical procedure.

The factor of judicious timing of surgical intervention is of utmost importance, particularly in infancy. A temporizing attitude in the face of marked symptomatology in a cyanotic child may lead to a sudden unexpected death rather than to be a relatively low risk operative procedure. An overzealous attitude, on the other hand, can needlessly hasten an adequately compensated child towards a relatively high risk operation which could well be put off for several years with an anticipated subsequent reduction in the surgical risk.

Although a conservative operative philosophy in the face of high risk surgical procedures is rational, it is essential to recognize the need for aggressive surgical therapy in some situations. The critically ill infant with congenital heart disease presenting with severe dyspnea, congestive

heart failure or cyanosis can represent a true surgical emergency, demanding early diagnosis and aggressive surgical therapy within hours or at most days of the onset of symptoms.

Non-Cyanotic Lesions

The uncomplicated atrial septal defect, patent ductus arteriosus and post-ductal (adult) coarctation have become routine procedures from a technical standpoint in most major cardiac centers with an operative risk of less than one per cent.

It is important to note that documentation is accumulating on the spontaneous closure of various left to right shunt defects. Recent studies have conclusively demonstrated the spontaneous closure of ventricular septal defects early in infancy including some large enough to have precipitated congestive heart failure.28 The overall incidence of spontaneous closure of ventricular septal defect remains inadequately defined but after early infancy, this would appear to be in the range of five to ten per cent of the significant sized defects. Of considerable interest are the recent reports of the much less frequently observed spontaneous closure of atrial septal defect29 and patent ductus arteriosus.30, 31

Preductal or so-called infantile type coarctation of the aorta, where there is narrowing of the aorta beginning in the distal transversae aortic arch associated with a patent ductus arteriosus distal to the site of coarctation continues to have a high medical and surgical mortality.32 There is often an associated intra-cardiac malformation (ventricular septal defect) and severe pulmonary hypertension with pulmonary vascular obstructive changes. This infant is usually in severe right and left heart failure and operative intervention for resection of the coarctation and patent ductus arteriosus continues to be associated with a mortality of 50 per cent or more.

The management of a symptomatic infant with large venticular septal defect has had considerable attention and study in recent years.33 The conservative school recognizes that the vast majority of these infants may be stabilized and carried with medical management alone (digitalis, diuretics) to an age when: (1) surgery may not be necessary since the defect has became quite small or even closed, or (2) operative therapy can now be offered at a surgical risk of less than five per cent. Surgery, either palliative pulmonary artery banding or open heart repair of the ventricular septal defect is recommended for infants with marked cardiac enlargement, large pulmonary blood flow and pulmonary hypertension only if optimal medical management has failed to control congestive heart failure, or if no significant growth increment can be achieved. A few infants with ventricular septal defect present with intractable pulmonary edema in the first few months of life and here emergency operative intervention may be necessary. An intravenous infusion of epinephrine (0.5 to 1.5 micrograms per minute per kilogram body weight) can be used as an inotropic agent to improve left ventricular contractility in these desperately ill infants while being prepared for surgery.34

Since the risk of surgical closure of a large ventricular septal defect associated with severe pulmonary vascular obstructive disease is prohibitively high, an important category of infants with ventricular septal defect who should be considered for early surgery are those with high pulmonary arterial pressure and increased pulmonary blood flow in whom there are clinical or catheterization findings to suggest progress-

ion of an already moderately elevated pulmonary vascular resistance. The chance of development of pulmonary vascular obstructive disease in unselected instances of ventricular septal defect is uncommon in the pediatric age group and probably is in the range of five percent; however, careful repeated clinical examinations and occasionally repeat cardiac catheterization studies are necessary to identify these patients sufficiently early for possible surgical identification.

In most cardiac centers, a palliative procedure, pulmonary artery banding, is still being employed when surgical management is dictated for the very young infant (less than one year of age) since an acceptable operative mortality of less than ten per cent can be achieved in the infant with an uncomplicated large ventricular septal defect. A few centers at the present writing have demonstrated an acceptable open heart surgical mortality and advocate direct surgical closure of ventricular septal defect in the young infant because it obviates the necessity of any second major surgical procedure when the patient is older.35

The management of intracardiac malformations of the left heart remains somewhat unsatisfactory, perhaps not from the standpoint of operative mortality which is low, but because of the frequency of unsatisfactory hemodynamic results with significant post-operative residual abnormalities. In particular, the longterm results of valvotomy for congenital aortic valve stenosis suggest that in a significant number of patients, eventual reoperation and possible aortic valve replacement will be indicated in the future. Since moderate aortic valve stenosis is well tolerated in childhood, conservative management is advocated for the present.36 Localized subvalvar aortic stenosis, when it is of the fibrous or localized muscular type situated just beneath the normal aortic valve, can be well approached through an aortic arteriotomy with low operative risk and excellent post-operative hemodynamic results. On the other hand, diffuse subvalvar muscular aortic stenosis (idiopathic hypertrophic subaortic stenosis) remains a difficult problem requiring an extensive excision of left ventricular muscle.

Cyanotic Lesions

The indications for surgery in tetralogy

of Fallot and the type of surgery to be performed varies with the age of the patient and with the anatomy of the right ventricular outflow tract and pulmonary arteries. The infant with tetralogy who presents with paroxysmal dyspnea, deep cyanosis and failure to gain weight will need early surgical intervention. Since open heart total repair of tetralogy of Fallot in the infant has a high surgical risk at the present time, a palliative systemic-pulmonary anastomosis procedure remains the operation of choice. A descending aorta to left pulmonary artery anastomosis Smith-Gibson procedure) or an ascending aorta to right pulmonary artery anastomosis (Waterston-Cooley procedure) may be preferred in the youngest infants over the subclavian to pulmonary artery anastomosis (Blalock-Taussig procedure) since the aortic to pulmonary anastomosis tends to remain patent and functions adequately in a much larger number of infants. In the older infant and child, the subclavian to pulmonary artery anastomosis is preferred since this form of palliative anastomosis is much less difficult to close off at the time of subsequent open heart corrective surgery.

In the child from two to five years of age with tetralogy of Fallot, surgery is indicated when paroxysmal episodes of dyspnea, frequent squatting, extreme polycythemia (hematocrit 70 per cent or above) or significant limitation of physical activities are present. In general, the palliative anastomosis procedures, particularly the subclavian-pulmonary anastomosis, are the operations of choice if the clinical and angiocardiographic studies indicate the presence of pulmonary atresia (pseudotruncus type of tetralogy of Fallot), marked hypoplasia of the pulmonary anulus or pulmonary arteries, or extreme overriding of the aorta.

In late childhood or early adolescence, open heart surgical correction of tetralogy of Fallot is recommended unless extreme polycythemia or extreme pulmonary artery hypoplasia are present. If open heart surgical correction of tetralogy of Fallot is to be successful, the patient must have a relatively typical tetralogy of Fallot complex with a suitable outflow tract anatomy. Skillful and precise angiocardiographic studies provide the best evidence that the right ventricle and pulmonary arteries are

sufficiently developed and the aorta is suitably positioned to allow successful repair; a previously performed successful systemic to pulmonary anastomosis must never be assumed to confirm the diagnosis of tetralogy of Fallot or to establish the intracardiac anatomy as suitable for total correction.

The current overall mortality rate with open heart surgical correction of severe tetralogy of Fallot is about ten per cent in the most experienced hands.

Complete transposition of the great vessels with normal cardiac chamber architecture is the most common cause of cardiac cyanosis at birth and also the most common fatal cardiac malformation in the early weeks and months of life. The aorta arises from the right ventricle and the pulmonary artery from the left ventricle and the resulting complete separation of venus and arterial routes of blood flow is generally incompatible with prolonged life. Only a few infants with transposition have adequate mixing of the pulmonary and systemic circulations by virtue of a large atrial or ventricular septal defect. These infants, often with associated pulmonary stenosis or pulmonary vascular obstruction, may manifest only moderate cyanosis and little distress and may be managed conservatively in infancy.

Most infants with transposition, however, are critically ill early in life and require prompt surgical palliation if they are going to survive. The dramatic advances of the past decade in palliative and corrective surgery for congenital heart malformations are perhaps most striking when the present therapy of transposition of the great arteries is considered. The physician confronted today with a dyspneic and severly cyanotic newborn with this diagnosis can approach the problem with considerable hopefulness in contrast to the grim hopelessness of a few years ago. The presence of deep cyanosis associated with dyspnea and congestive heart failure in the infant with transposition of the great arteries is an indication for early efforts to increase intracardiac shunting and to relieve left atrial hypertension. Creation or enlargement of an atrial septal defect is the simplest approach for providing intracardiac bidirectional shunting of blood. Surgical creation or enlargement of an atrial septal defect may be carried out as a rela-

for December, 1967

tively simple closed heart procedure by dissecting out and excising the posterior aspect of the interatrial septum (Blalock-Hanlon procedure).37 An open heart technique utilizing brief venous inflow occlusion can also be used for surgical creation of an atrial septal defect under direct vision. An operative mortality of about 20 per cent and modest increases in arterial oxygen saturation of 25 or 30 per cent are reported. A somewhat more complex procedure for providing a more adequate obligatory mixing of pulmonary and systemic circulations can be accomplished by a partial venous corrective technique (Baffes procedure) which transfers the right pulmonary veins to the right atrium and the inferior vena cava to the left atrium.

A nonsurgical technique for creating or enlarging an atrial septal defect has recently been reported and has had wide application in some clinics.38,39 A deflated balloon-tipped catheter is introduced into the femoral vein and directed across the patent foramen ovale to enter the left atrium. The balloon is then inflated with 2 to 3 cc of radiopaque dye and the catheter sharply drawn across the shunt-limiting valve of the foramen ovale in an attempt to rupture this tissue. This method has obvious advantages in that it can be applied to the critically ill transposition infant without general anesthesia or thoractomy. Our experience in 32 infants indicates that the immediate post-ballooning clinical improvement has been quite satisfactory and the procedure can be carried out with little morbidity or mortality.

The role of pulmonary artery banding in the palliative management of transposition of the great arteries has not yet been clearly defined. Certainly in patients with transposition of the great arteries and large ventricular septal defect, there is an unusually high incidence of progressive, severe pulmonary vascular obstructive changes noted in late infancy and if these infants are to be salvaged in terms of possible later total correction, early pulmonary artery banding seems indicated.40

Total correction of transposition of the great arteries has become a clinical reality with development of a venous corrective procedure which utilizes an interatrial pericardial tissue baffle to redirect the pulmonary venous return into the right ventricle and the systemic venous return into the left ventricle.41 Since in general the atria are not considered large enough to allow introduction of a pericardial baffle for creating the new venous blood pathway until about 18 months of age, the successful application of this procedure depends upon the prior use of palliative procedures for transposition of the great arteries in early infancy.

Summary

Reappraisal of the progress and goals in pediatric cardiology suggests the following two conclusions: (1) Since no etiologic factors are apparent in over 95 per cent of all instances of congenital heart lesions, there is an obvious need for increased efforts in the areas of etiologic and pathogenetic research as compared to the highly developed areas of diagnostic and therapeutic research. (2) The challenge of the distressed newborn and young infant with a complex congenital heart malformation is apparent since over 60 percent of these infants will succumb by six months of age. The technical proficiency of the cardiovascular surgeon in many respects exceeds understanding of pre- and post-operative physiology and biochemistry. In the neonatal period, these factors, rather than the surgical technique itself, often determine whether the infant lives or dies. Further reduction of operative mortality will be accomplished through improved accuracy of pre-operative diagnosis, refinement of surgical techniques and development of a post-operative care regime based upon the recognition that in an extremely ill neonate, there is little margin for error.

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SWISS DRINKING DRIVERS

Many Swiss drinking drivers now carry slide rules, issued to them by their insurance companies, which calculate whether the driver can safely drive after a relaxing evening with friends and a few drinks. The slide has separate scales graduated for body weight, quantity of alcohol drunk and time elapsed since the first drink. By pushing the different scales into proper alignment, the driver can tell whether he has a safe and legally permissible blood alcohol level (which is only 1.18 per cent in Switzerland) or more. The only drawback is that the driver must be able to see well enough to read the rule.

GP (Oct.) 1966, pg. 15.

A Fresh Clinical Look At Meniere's Disease

By Jack D. Clemis, M.D./Chicago

It is unfortunate but true that Meniere's disease has become a wastepaper basket diagnosis for the dizzy patient much like "pinched nerve" for pain syndromes and "the flu" for general malaise. The diagnosis is too often made by exclusion based on negative E.E.G., E.K.G., skull films and blood chemistry findings. Audiometric and vestibular testing is uncommonly done and otologic consultation frequently deferred until the later stages of the disease. It, therefore, seems timely to review the clinical aspects of this disease and briefly outline some of the current concepts in management.

Meniere's disease is a clinical syndrome with specific characteristics which should be defined, not only that an accurate diagnosis can be made, but also that baseline measurements can be established so that a correct assessment of therapeutic results may be made later. Meniere's disease is a common, chronic, benign disorder of the inner ear of unknown etiology due to increased endolymphatic pressure, resulting in attacks of vertigo, in sensorineural hearing loss, tinnitus and a sensation of fullness or pressure in the affected ear; any or all symptoms

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may be present. Especially characteristic of the disease is natural spontaneous remissions and exacerbations which make therapeutic results difficult to assess.

Dizziness Feared by Patients

Dizziness is the most dramatic symptom of the syndrome, being the most feared and incapacitating to the patient and most frequently the one bringing him to the doctor. Dizziness of labyrinthine origin is characteristic and medically termed 'vertigo'. Only when the physician interprets a patient's dizziness to mean an hallucination of motion, usually rotary, may it be labeled vertigo. Differentiation between autokinetic and heterokinetic vertigo is clinically unimportant. It is important to remember that all that's dizzy isn't vertigo, and all that's vertigo isn't Meniere's disease. Vertigo comes in attacks lasting from a few minutes to one or two days, frequently accompanied by vegetative symptoms of sweating, tachycardia, nausea and vomiting. Unlike epilepsy, the onset is usually abrupt without warning and there is no period of unconsciousness.

Vestibular function tests vary with the phase of the disease and may be normal or may reveal various degrees of hypoactivity. While these tests offer little diagnostic information in the disease as a whole, they may be important in plotting the course of the disease in a single individual or in objectively establishing effectiveness of therapy. Nystagmus, the most constant predictable reflex resulting from vestibular stimulation, can be charted on a record called an electronystagmogram (E.N.G.). An E.N.G. is ideally suited for serially examining labyrinthine function. Vestibular function tests should be carried out in every single case of vertigo. While the nonfunctioning labyrinth is uncommon in Meniere's disease, it is common in an acoustic neurinoma, a potentially lethal lesion which is not always clinically distinguishable from Meniere's disease.

Hearing Loss Indicative

The hearing loss in Meniere's disease has two components, a fixed or irreversible loss with a superimposed fluctuating component. During an exacerbation the hearing may become worse, then may reverse either totally or in part with remission. This fluctuating characteristic of hearing is, therefore, not only an index of disease activity but also

of reversibility. The hearing loss is usually unilateral and is characterized by a loss for clarity as well as for loudness. While loudness is measured with a pure tone audiometer and is recorded as a threshold evaluation in decibels, 0-20 dB being normal*, speech discrimination tests are used to measure clarity which in turn is recorded as a percentage, 90 per cent to 100 per cent being normal. The fluctuating nature of hearing is best followed by measuring serial discrimination scores for speech for this varies much more widely and constantly than does the pure tone threshold.1 Should there be a diagnostic problem wherein the site of lesion is in question, a special audiometric test battery may be employed including: Pure tone and speech audiometry; loudness balance studies; short increment sensitivity index; Bekesy audiometry; and modified tone decay testing which, as a battery, helps to differentiate cochlear (Meniere's disease) from retrocochlear pathology (acoustic neurinoma, multiple sclerosis). Since these tests require special equipment, trained personnel and several hours to complete, they must be ordered discriminantly. Diplacusis is a difference in perceptual discrimination for pitch or tonal quality when matching one ear against the other. It is characteristic of hydrops and can be quickly tested with a 256 cps tuning fork.

Tinnitus Without Diagnostic Implication

Tinnitus and the sensation of fullness in the ear are infrequently the patient's chief complaint and are symptoms of a variety of disease processes located almost anywhere within the temporal bone and, therefore, offer no diagnostic implication.

Treatment of any disease is the manner of applying remedies to cure while management is the manner of effecting control. Treatment implies specific etiologic therapy which brings the course of a disease to termination while management suggests therapy aimed at suppressing symptoms but without halting the progress of disease. Management of Meniere's disease falls into three catergories: 1) General Medical Measures; 2) Drugs; 3) Surgical. Specific pathophysiology is as yet unknown, but a small percentage of cases can be maintained in a state of suspended progression by treating various endocrinopathies and allergic

*International Standards Organization

states.² Prohibition of tobacco use has been singularly invaluable.

The one factor of greatest importance in management of any patient with this disease is gaining rapport and securing control of the psychological or emotional factors which are "always" present, whether superficial and obvious, or deep rooted and inapparent. With this control a patient's confidence is established; without it any long term management is on a precarious foundation. This type of rapport involves the art of medicine and should be established on the first office visit.³

Drugs Have No Curative Value

While drugs have no curative value whatsoever,⁴ there is a broad chemotherapeutic armamentarium available that are good to excellent labyrinthine suppressants or that alter conscious representation of vertigo, including antihistamines, sedatives, anticholineurgics and tranquilizers.

Vitamins A, C, D, and B₁₂, and more recently bioflavinoids^{5,6} have been extensively prescribed, their greatest value is to the drug houses. Shambaugh, in an uncontrolled series, failed to observe a significant improvement in symptoms attributable to the drug.⁷

Gillespie et al,8 in a double blind study on 75 patients, reported no rationale for the use of bioflavenoid therapy in various described sensorineural hearing losses.

Vasodilator therapy using nicotinic acid or roniacol tartrate has been widely accepted. Since there is no evidence that these agents, used either singly or in shot-gun proprietary mixtures in the usual clinical dosage, produce vasodilation except in the blush area of the head and neck,9 neither academic rationalization nor clinical impression warrants their use.

Correction of various endocrinopathic states has resulted in some dramatic results^{10, 11} but in all too few cases and further controlled studies are needed.

Dilute Subcutaneous Histamine

Dilute subcutaneous histamine has continued over the past 20 years to be the best drug available for the management of the ambulatory patient.¹² A detailed description of its use may be found elsewhere.^{13, 14} Within the past few months a new synthetic molecule resembling histamine labeled betahistine hydrochloride (Serc) has been re-

leased. Early clinical trials fell short of being ideal.^{3,25} In an uncontrolled group of 31 patients given the drug in our practice not one case resulted in significant symptomatic improvement attributable to the drug.³

The majority of patients can be controlled within tolerable limits on various medical regimens. Surgery is indicated in the disabled or demoralized patient in whom medical management has failed. Newer, more conservative, precise and physiologic surgical techniques now being developed may soon expand these indications.

Simpler Techniques Recommended

When the otologist feels that hearing is salvageable or when both ears are involved in this disease as it may be in 10 per cent of cases, serious consideration should be given to procedures which attempt to preserve cochlear function (Table I) .15, 16, 17, 18, 19, 20, 21, 22 Vestibular nerve section should be reserved for specially selected cases, not only because of the magnitude of the surgical approach, but also because of the potential morbidity and mortality in comparison with simpler techniques which achieve the same if not better results. Special equipment and training are needed in the use of ultrasound in order to obtain satisfactory results and to avoid permanent injury to the facial nerve. Operations on the endolymphatic sac are designed to restore endolymph-perilymph pressure relationships which are believed responsible for the symptoms of the disease. Except for Portmann's series, long term results in these operations are lacking. Preliminary reports are most encouraging for the relief of vertigo, less so

for tinnitus, fullness and pressure, and almost no effect has been noted on hearing.

When hearing conservation is not in question, a destructive labyrinthectomy may be done either transcanal through the oval and round windows or transmastoid by opening the semicircular canals and avulsion of the membranous system. Just beyond the semicircular canals lies the internal auditory meatus which may be opened to section the VIIIth nerve. Dysequilibrium is expected postlabyrinthectomy, the duration of which is quite unpredictable.

Summary and Conclusions

The pathology of Meniere's disease is known; the etiology in most cases is not, but allergic hydrops (10 per cent) and endocrinopathic states (5 per cent) account for a small proportion of cases. Obliteration of the endolymphatic duct²³ and sac²⁴ has been observed in association with endolymphatic hydrops.

Most patients can be managed with general medical measures, and drugs to suppress vertigo, but drugs have no curative value in Meniere's disease. Surgery is indicated in any case of persistent vertigo despite medical management. Radical procedures are indicated when hearing loss is extensive and conservation of hearing is not a consideration. Results of conservative procedures are best for vertigo, good for fullness and tinnitus, and least for hearing improvement.

Only as aggressive and progressive research discloses the etiologic factors responsible for this complex syndrome will clinical emphasis shift from emperic symptomatic management to precise specific treatment.

TABLE I A CLASSIFICATION OF SURGICAL PROCEDURES FOR MENIERE'S DISEASE

- A. Conservative (attempt to preserve hearing)
 - Ultrasonic labyrintholysis (Arslan)
 Operations on the Endolymphatic Sac
 - incision and drainage (Portmann)
 - endolymphatic-subarachnoid shunt (House)
 - decompression (Clemis)
 - revascularization (Shambaugh)
 - 3. Selective Eighth Nerve Section (Vestibular)
 - posterior fossa approach (Dandy)middle fossa approach (House)
- B. Radical (inner ear ablation)
 - transmastoid via semicircular canal (Cawthorne)
 - transtympanic via oval window (Schuknecht)
 - translabyrinthine eighth nerve section (House)

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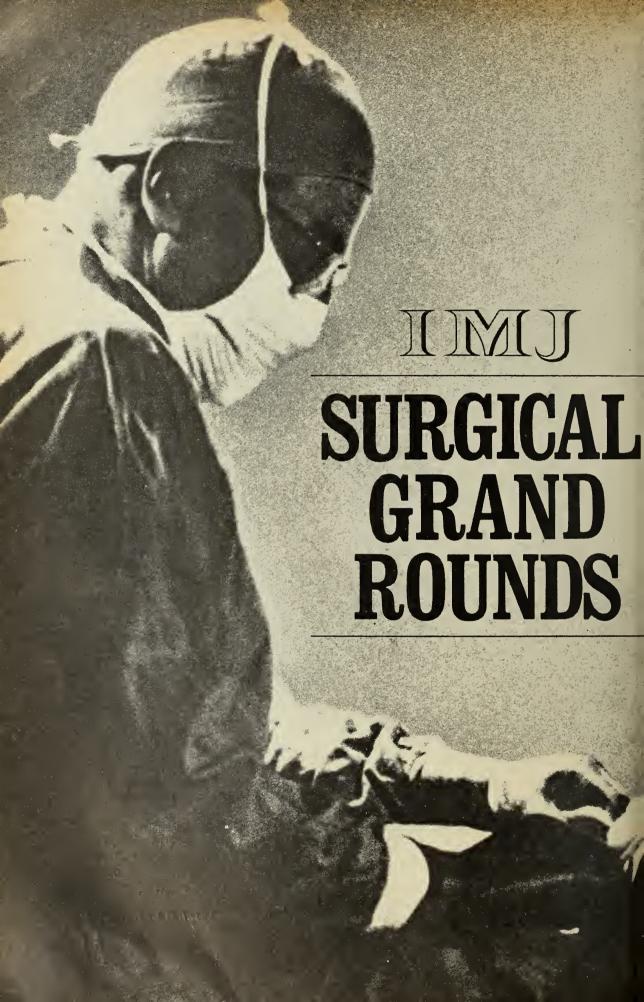
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EMOTIONAL DISORDERS IN FAMILY PRACTICE

When a patient first sees the family doctor or specialist, there is no question that a complete examination and diagnostic study should be done. However, after this is completed and it is the opinion of the doctor that the patient has an emotional disorder, he should be told the diagnosis. This information can be given tactfully without making the patient feel he is out of his mind, since it is at this point that the seeds of a crippling neurosis might be cultured or degerminated. No doubt should be left in the patient's mind. Some doctors feel they need to keep the door open in case they have missed something. However, I believe one must have the courage to take a chance on making a mistake. If one does not, an endless series of examinations, laboratory tests and X-ray studies result. Every rare disease may be postulated and checked. The patient becomes more anxious, begins to doubt the doctor and may begin trips to wellknown clinics throughout the country. Meanwhile, the neurosis becomes more fixed.

What problems does the family doctor or specialist refer to a psychiatrist? Generally, I would say he refers patients having psychotic reactions and the more severe psychoneurotic reactions. If he has any doubt, the physician can refer the patient to a psychiatrist for consultation for the purpose of learning if more intensive care is needed or for getting some guidance in handling the patient himself.

Referring a Patient to a Psychiatrist. David H. Smith, M.D. South. M.J., 59:7, (July) 1966, pp. 779-781.



Massive Intestinal Hemorrhage And Leiomyoma Of Small Bowel

Edited by John Beal, M.D.

Northwestern University Medical Center

Surgical Grand Rounds are held weekly at 8 a.m.; alternating between the Staff Room, Chicago Wesley Memorial Hospital and Offield Auditorium, Passavant Memorial Hospital. Patient presentation from these hospitals and from the Veterans Administration Research Hospital form the basis of the discussions. This case report was part of Surgical Grand Rounds held at Passavant Memorial Hospital on June 3, 1967.

Dr. James Simonson: A 67-year-old white female was admitted to Passavant May 2. 1967, to the medical service with complaints of generalized weakness of two days duration and 4-5 black tarry stools the morning of admission. She had vague left lower quadrant discomfort but no nausea or vomiting. She denied any ulcer history or bleeding tendencies. She had suffered from similar episodes of melena about every two to three years for the past 15 years. She had been hospitalized elsewhere and usually required two to three units of blood each time. A source of bleeding had not been found. In 1961 she had contracted serum hepatitis following three transfusions. Her last previous episode of bleeding was in 1964 and she was admitted to another hospital, where a complete gastrointestinal radiologic study was unremarkable. Her hematocrit at that time was 27 per cent. The remainder of her past history and review of symptoms was noncontributory. A familial history of bleeding was absent.

Physical examination: blood pressure 135/80 sitting and recumbent, pulse 88 and regular. Except for minimal left lower quadrant abdominal tenderness, physical examination was within normal limits.

Hematocrit 30 per cent; platelet count, coagulation time, bleeding time and pro-

thrombin time were within normal limits.

She continued to have occasional tarry stools. Her hematocrit was 24 per cent the day after admission and a whole blood transfusion was given. Because of her previous hepatitis the patient received gamma globulin. On the third day of admission after five units of blood her hematocrit was 26 per cent. After a seventh unit of blood her hematocrit rose to 34 per cent but decreased to 28 per cent on the fifth day of admission. An upper gastrointestinal series was reported as normal. Difficulty in crossmatching her blood caused postponement of a proposed operation. On the ninth hospital day her hematocrit was 21 per cent and hemoglobinurea was detected. Cortisone was administered preoperatively. When laparotomy was performed a lesion of the ileum was found and a small portion of the ileum was resected. A unit of blood had been started before operation, and another unit was added during the procedure to give her a total of 10 units of blood during her hospital course. Transfusion was not required after operation and she made a satisfactory recovery. Urine was clear the day following operation. Indirect bilirubin levels decreased from 3.5 the day after the surgical procedure to .4 the following day. She was discharged 13 days after operation with a hemaglobin level of 10 gm. and an hematocrit of 30 per cent.

DR. Joseph C. Sherrick: We received a segment of small intestine containing a large submucosal tumor, 5 cm. in diameter, and dumbbell in shape. In Fig. 1 this tumor has been cut in half to show origin from the wall of the intestine. The cut surface is fleshy, soft and lobulated. This is the typical gross appearance of a leiomyoma. Microscopically, one sees spindle-shaped smooth muscle cells which are uniform in size and shape and which are arranged in interlacing bundles.

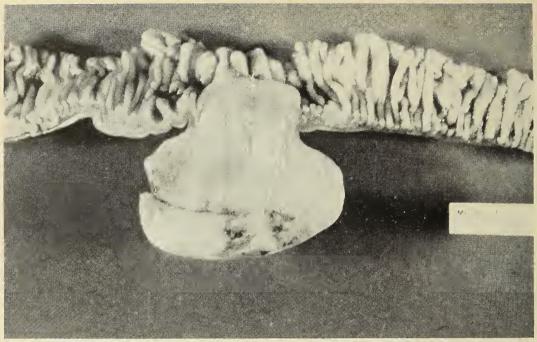


FIG. 1, Photograph showing large intramural leiomyoma of small intestine which had bled repeatedly.

(Fig. 2) The mucosa over the central portion of the tumor was ulcerated, which accounts for the repeated episodes of bleeding.

The other thing that requires comment in this case is the hemolytic transfusion reaction, fortunately an infrequent event. When the patient was admitted, she was badly in need of blood transfusions. Her blood group was O, Rh positive. This is a common blood group, and crossmatching presented no problems. The patient was given eight units of blood over the next five days. On the sixth hospital day the ninth transfusion was followed by a slight chill and fever to 101°F. On the seventh hospital day hemoglobin was present in the urine and blood plasma, and a sample of blood obtained after the transfusion could not be crossmatched with any of the eight units of O positive blood in our blood bank. It was obvious that the patient had a hemolytic transfusion reaction.

Investigation of a hemolytic transfusion reaction involves identifying the cause of the increased blood destruction. This was done by examining a post-transfusion sample of the patient's serum, which revealed a high titer of anti "c" antibodies. Complete blood typing of the patient revealed that her Rh phenotype was CCDee, or R₁R₁, and that she was thus capable of forming antibodies to the Rh factor "c" (hr'). The "c" factor is not a good antigen, and many injections are necessary to produce anti "c" antibodies, so

that it is not usually a problem in blood transfusions. However, in the case under discussion, there had been transfusions in the past, and then a series of recent transfusions spread over a period of five days. Moreover, when the donor blood from these transfusions was re-examined, it was found that six of the eight donors' blood samples contained factor "c", so that conditions were almost ideal for producing antibodies. Because "c" is not a good antigen, the type of transfusion reaction was a delayed one, as described by Croucher, Crookston and Crookston, (1967) and Roy and Lotto (1962). Hemolysis occurred gradually, and indeed was almost unnoticed by the clinicians. The urinary output was not impaired, and the patient suffered no ill effects from the reaction. She needed blood, and since only about 20 per cent of the population have blood of the same type as this patient, we had to search for it. Fortunately, we were soon able to obtain compatible blood, the operation was performed, and the patient should be cured of a problem that has been troublesome for 15 years.

We would much rather prevent a transfusion reaction than investigate one afterwards. Prevention is best accomplished by furnishing the blood bank with a history of the patient's previous transfusions and pregnancies, particularly if there has been a history of difficulty with blood transfus-



FIG. 2. Photomicrograph of tumor showing that it is composed of interlacing bundles of uniform smooth muscle cells.

ions. Secondly, the blood bank should be allowed time for obtaining blood. Every patient receiving blood should be watched closely for transfusion reaction, and any reaction should be reported promptly to the blood bank.

Dr. Harold Method: I won't belabor the point of the small bowel tumors. They are as rare as a carcinoma of the small bowel. I think it is significant in this case that this patient had a small bowel tumor; that she had had repeated hemorrhages over a 15year period and she had been worked up at least that many times, including small bowel studies, yet she had never been explored. I saw this patient on day number nine of her hospitalization only because the medical service wanted to make a preoperative diagnosis before turning the case over to a surgeon. It is almost impossible to make a preoperative diagnosis with this type of small bowel tumor. It was extramural. Our preoperative diagnosis was a Meckel's diverticulum because we felt that if she had had this intermittent gastrointestinal bleeding for 15 years in absence of any duodenal lesion, statistically she had to have a benign lesion somewhere in the small bowel. Upon exploration of this patient's abdomen we found a pear-shaped tumor mass presenting from antimesenteric border of ileum. There was central necrosis of tumor and she had been bleeding into the lumen of the bowel. In reviewing the literature, Louis Rivers in 1954 stated that 75 per cent of the deaths from small bowel tumors are due to hemorrhage, and I think it behooves all of us to think more of small bowel tumors and massive gastrointestinal hemorrhage, and look a little more for the rare things. Most small bowel tumors do not cause any symptoms unless they are intraluminal and cause intussusception or obstruction. Most of them are silent and are not palpable on examination.

DR. JOHN BEAL: Several of the points that have been made are important. Small bowel neoplasms should be considered in the differential diagnosis in patients with unexplained anemia. The presence of these relatively uncommon tumors may be difficult to detect. A patient that we treated several years ago had been operated upon in another institution because of anemia, and a splenectomy was performed. The patient continued to have anemia at length and someone performed a stool examination for blood which was present. The patient was sent to us to be explored and was found to have carcinoma of the small bowel. Bleed-

ing may well be the presenting symptom in patients with small bowel neoplasms, be-

nign or malignant.

Dr. Marion Anderson: We had a very similar problem several years ago which emphasizes what Dr. Method has said. The patient was hospitalized for a third episode of massive gastrointestinal hemorrhage. The only positive finding in the gastrointestinal work-up was a single diverticulum in the sigmoid colon. She had received a total of 20 pints of blood prior to operation, which revealed a leiomyoma of the ileum. On reviewing the small bowel studies this was not obvious even in retrospect. It is important to emphasize that a negative small bowel series does not exclude the possibility of a bleeding site at this level in the gastrointestinal tract.

Dr. John Beal: What was the reason for giving the patient cortisone before opera-

Dr. Harold Method: The medical service wanted to avoid further anaphylactic reaction from transfusions.

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SMOKING AND HEALTH

The first speaker was Frederick Decker, president of Decker Communications, Inc., and publisher of Printers Ink. The advertising business, he said, was not opposed to regulations which are clearly in the public interest, but many people in advertising and business take a dim view of health warnings on two grounds: first, a compulsory curb of this kind is inconsistent with the principles of competitive enterprise and individual freedom and second, a compulsory warning in advertising would not accomplish what its proponents would hope-elimination of cigarette smoking.

Decker explained that cigarettes are one of the few products that sell themselves. Nearly all people who are going to buy them are doing so already. Advertising only influences people to use one brand in

preference to another.

Mandatory health warnings would not cause grave economic losses to the advertising business. The \$300 million cigarette advertising investment in the major media is only 2.1 percent of the annual advertising investment in this country. However, magazines would lose over 3 percent of their total advertising income, radio would lose 3.5 percent, and TV would lose 7 percent of its total revenue. These losses would not be devastating, but harmful and unnecessary, Decker stated. He pointed out that the ban on cigarette advertising in Italy shows that cigarete sales did not decrease. Public Health Reports, Vol. 81. No. 3, March 1966.

THE FORGOTTEN JOY OF MOTORING

In this frantic age we live in, we appreciate a good automobile it rides smoothly, has good pick-up, is low on gasoline, and altogether, is pleasant to drive but is essentially a vehicle to get us from one place to another. Our fathers, and some of us, remember the automobile of 40 and 50 years ago when, in addition to going from here to there, there was the pure joy of being in a moving vehicle and traveling slowly through the country side. Several years ago my wife and I drove to Dover for the chicken festival. I had been over the road innumerable times, always driving to get from here to there but as I cruised along at 35 miles per hour-not quite top speed-I was amazed at all the things I had never seen before. What I'm trying to say is that there is more to owning an old car than the pride of possession and going to car meets to see other cars. There is a little escape from reality, a nostalgic journey back to an age that was less hurried. Delaware Medical Journal, April 1966.

Comparative Evaluation of Two Psychotropic Agents in Depression Related To Organic Disease

By John M. Coleman, M.D./Chicago

The introduction of a perphenazineamitriptyline preparation for depression and anxiety has been an interesting outgrowth in the development of psychopharmaceuticals. The plethora of articles appearing in the literature¹⁻¹⁰ on successes achieved with the compound led to our decision to evaluate the preparation.

The purpose of the study was to examine the efficacy of perphenazine-amitriptyline* (Etrafon) as against another widely used antidepressant** (Librium) in treating emotional or reactive disturbances with an underlying or co-existing depression and anxiety related to organic or somatic disease.

Anxiety as manifested in the patients in this study was restlessness, agitation, sleeplessness, feeling of impending danger and a propulsive type of activity.

Depression was characterized by dejection, hopelessness, feeling of rejection, and reduced or lack of activity, with fits of moroseness and crying.

Greater Behavioral Potency

Perphenazine is a piperazino-type phenothiazine. Members of this group possess a greater behavioral potency than phenothiazines of other groups without the corresponding increase in hepatic, hematologic, or autonomic side effects.

Amitriptyline hydrochloride, a dibenzocycloheptadiene derivative, is an effective and widely used antidepressant agent (not a monoamine oxidase inhibitor) that acts primarily on the central nervous system. Its pharmacologic spectrum of activity consists of both antidepressant and tranquilizing components.

Etrafon,® Product of Schering Corporation, Union/Bloomfield, N. J.
 LibriumTM (chlordiazepoxide hydrochloride), Product of Hoffmann-La Roche Inc., Nutley, N. J.

Chlordiazepoxide is a benzodiazepines derivative which differs from other tranquilizers in that it also relaxes muscles. Compendium of results points to the limbic system of the brain as a probable site of action.

Two Similar Types of Drugs

The study, therefore, was initiated as a modified double-blind comparison of two similar types of drugs on 110 anxiously depressed patients, approximately 53 patients on one and 57 patients on the other. The drugs were supplied to the patient either in the doctor's office or in the hospital with neither the doctor nor the patient having any knowledge of the particular drug being prescribed. This was accomplished by having the nurses package the two preparations under the code names of A or B. Thus, the physicians involved were completely unaware of which drug was being dispensed. There was no attempt to select difficult cases for code A or B, nor was there any attempt made to dispense according to organic or somatic disease [The method of dispensing the drugs was on a random, alternate basis.] The dosage schedule used in both the code B, which was Etrafon, and the code A, which was Librium, was identical (one tablet, three times a day).

Age Not Important

Although patients ranged in age from 19 to 75, age was not considered important. Patients manifesting anxiety with co-existing depression were chosen primarily for these conditions. The types of patients reviewed within this particular study included

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those so often seen crossing the many specialties, the daily visitors to most doctors' offices. The majority, probably three-fourths of them, had a serious or treatable organic disease, which was a contributing factor to the anxiety/depression because of some metabolic or physiological response associated with it. (See Pathology Table)

There were no exclusions except when extenuating factors made such patients undesirable for this or any other study. Patients known to be uncooperative, either through lack of intelligence or with negativistic personality traits, were excluded from the study. Most of the patients included were cooperative and presented no difficulties in carrying out the planned protocol.

Alcoholics Among Patients

Acute and chronic alcoholics were among the patients treated. Others included a fairly large sampling of arteriosclerotics (cerebral vascular arteriosclerosis in the aged, acute cerebral vascular accidents, arteriosclerotic heart disease, and myocardial infarction). There were patients who had been involved in traumatic injuries with associated fractures and/or muscle or musculoskeletal injuries with accompanying depression and anxiety.

Among some of the miscellaneous indications with anxiety and depression were low-back strain and muscular injury from either an automobile accident or athletic injuries; asthmatics; vertigo due to vestibular disturbances; women in the early adult life with severe premenstrual tension; patients with disabling hernias; and those who were faced with the possibility of surgery. We had several individuals with disfiguring acne and one instance of alopecia areata in a young woman.

Wide Selection of Patients

In general, our study covered a fairly wide selection of patients who required therapy for their organic disease as well as for the associated anxiety and depression.

We intended to carry patients of either group A or B for periods of up to eight weeks. In the majority of cases, the procedure was explained to the patient and diligently followed. However, in a few instances, patients were not carried for the total of eight weeks. Many of these individuals achieved maximum improvement and relief earlier than had been anticipated. This situation was possible because patients were chosen not for chronicity but for the presence of symptoms of anxiety and associated

PATHOLOGY TABLE

Arteriosclerosis	$Code\ A$	$Code\ B$
Including myocardial, cerebrovascular and peripheral vascular. Also acquired heart disease, including rheu-	11	9
matic fever and hypertensive vascular disease.		
Neurological Disorders Including Grand mal seizures, chronic brain damage,	10	7
vestibulitis, intercostal neuritis, vascular headaches,	10	′
herpes zoster, primary optic nerve neuritis.		
Bronchopulmonary Disease	×	9
Including bronchial asthma, pulmonary emphysema, asthmatic bronchitis.	5	3
Gastrointestinal		
Including ulcerative colitis, peptic ulcer and functional bowel disease.	5	11
Genitourinary		
Including cystitis.	3	1
Gynecological Problems		
Including vaginitis, dysfunctional uterine bleeding,	6	5
ovarian insufficiency, pruritus vulvae.		
Musculoskeletal	_	
Including tuberculosis of bone and periarticular fibro-	7	11
sitis.		
Miscellaneous Including discusses of unknown of informatic and Parally	C	10
Including diseases of unknown etiology, such as Boeck's sarcoid, Raynaud's disease, obesity.	6	10
sarcora, reagriances disease, obesity.		

depression. Moreover, logically it is understandable that in an unselected series such as this, there are always some acute reactions that could be reversed quickly by good drug therapy.

Results

The study and its conclusion included a total number of 57 cases of code B, which proved to be Etrafon 2-25 and 53 cases of code A, which later proved to be Librium. Good results were those with complete recession of symptoms with return to normal living. Fair results were those with some relief of symptoms but not complete return to normalcy. Poor results were those where there was little, if any, relief with the patient still disabled.

Results of the 57 patients on Etrafon in anxiety were good in 50, fair in 2, and poor in 5; in depression, good 53, fair 1, and poor 3. Results with the 53 patients on Librium in anxiety were good in 31, fair in 9, and poor in 13; in depression, good 16, fair 9, and poor 28.

Both drugs were fairly effective in relieving anxiety as such. However, when depression was also involved, the code B drug, which was Etrafon, proved to be vastly superior to the other drug in providing relief. In some instances, the code A drug had to be discontinued in patients with moderately severe depressions because of a marked extension of the depression.

Among the neurotic complexes, overbreathing or hyperventilation associated with anxiety and depression, a frequent problem in every doctor's office, was successfully treated with Etrafon. Another condition which seemed to lend itself frequently to combined therapy (organic as well as psycho-physiologic treatment) was shingles. In our opinion, this indicates there is, in many people with this disease, a relationship between the disease and the development of a form of melancholia. Gastrointestinal problems also responded quite well to Etrafon as adjunctive treatment.

Severe or chronic gastrointestinal disorders such as functional bile disease, hiatus hernia with symptomatic dyspepsia, diverticulitis, and ulcerative colitis found many times to be associated with depression and anxiety also improved on Etrafon therapy.

Conclusions

We could conclude from our modified

double blind that Etrafon has a very definite efficacious effect—superior, at least in the light of this study, to the comparative drug, Librium, as far as depression in combination with anxiety is concerned. In the relief of anxiety per se, it would be difficult to draw any definite conclusions of superiority of one drug over the other without further in-depth studies with larger numbers of patients.

Side Effects

Both drugs exhibited a tendency to induce some sleepiness early in the study in about one-quarter of the cases. This could well be a result of the relaxing effect of either preparation. However, the effect rarely proved to be a problem since as the drugs were continued, the symptom became less prevalent or disappeared entirely. We did, however, make a special effort to avoid prescribing either preparation to patients working around moving equipment, driving vehicles, or in areas where sleepiness could become a problem. We felt it was better to be forearmed and forewarned in this exploratory study where it might be premature to assume that this possibility of increased danger might not exist. We did not, in fact, have any reported accidents or any other increased susceptibility to accidents in those of our patients doing industrial work, housework, or the usual sedentary activities of a business or professional man.

There were no persistent gastrointestinal symptoms in any of the patients from either compound. Mild nausea was reported in an occasional — not more than two or three — patients and did not require drug discontinuance. There were no signs of liver dysfunction or disturbance. Some of the hospitalized patients in the study did not reveal any evidence of blood changes and/or dyscrasias from either drug. There was no evidence of toxicity nor was there any suspicion at any time that either drug was jeopardizing the general health of the patient.

We think in considering the type of patients being studied and in the total concept of these drugs, code A, chlordiazepoxide, was in a certain sense partial therapy since it did not alleviate the problems of depression as well as the anxiety. Code B, on the other hand, tended toward giving more complete, comprehensive treatment to more of these patients since it did very effectively relieve both the depression and the anxiety.

As mentioned earlier, if there were situa-

tional reactions such as a loss of a close friend or member of the family with an accompanying reactive depression and grief syndrome proceeding beyond the normal limits, we found that with Etrafon many of these people were able to recover from their emotional imbalance or regain their equilibrium much more rapidly, often within a period of two to three weeks. Many felt they no longer needed drug therapy beyond this period. This fact, we believe, probably indicates a good example of the drug's efficacy to a far greater extent than if the preparation were studied for longer periods of time.

The drug was particularly effective in acute situations where patients were overburdened to a point where they felt incapable of coping with their life situations. This also seemed to be the case with acute illnesses, such as myocardial infarction or with severe injuries in which a severe personal setback was encountered. In these particular instances, although the patients might be responding well to the usual, conventional therapy, it was found that Etrafon served secondarily as valuable adjunctive therapy by relieving the anxiety, the depression, and the marked anguish that accompanied the condition to a far greater extent than could be achieved with chloriazepoxide. As a matter of fact, as we pointed out earlier, although the chlordiazepoxide did relieve anxiety, it did at times heighten or worsen the depression.

In chronic conditions, patients with sustained chronic diseases were responding well to medication for the primary organic disease but were often despondent over the prospect of long months of continued drug therapy. In such situations, Etrafon again proved a very superior drug insofar as relief of anxiety and depression was concerned. In those patients who had conditions which were not responding well to the medication or who had little hope of getting better because of the chronicity or nonspecific nature of their illnesses, Etrafon offered surcease in relieving the burden of despondency.

Thus, in the majority of these patients, Etrafon proved to be a worthwhile adjunct to treatment of reactive depressions or depressions due to situational problems; secondly, to those depressions which were associated with acute illnesses; and thirdly, those illnesses which were associated with either curable, remedial, or non-remedial chronic conditions.

The few failures encountered were in those patients who became more severely disturbed and required psychiatric care. They may have received some temporary relief, but in terms of recovery as measured by the yardstick of the patients who did well, they were considered failures. All of these patients were later found to possess severe underlying personality disorders. Moreover, they represented so few a number that statistically, we considered these failures as inconsequential.

Summary

In summary, this study is a reported double-blind comparative experience with 110 patients, 57 on perphenazine-amitriptyline and 53 on chlordiazepoxide, who were treated for either primary anxiety with depression or depression secondarily associated with some organic disease such as an acute injury or an acute or chronic illness responding to medical therapy but offering little hope of complete cure or in those patients who were resistant to therapy and were left with the prospect of a prolonged period of discomfort. These patients on perphenazine-amitriptyline did well both from the anxiety and the depression standpoint. The comparison drug, chlordiazepoxide, did a comparable job with anxiety and induced no greater incidence of side effects than did the perphenazine-amitriptyline in our study. However, in the majority of patients, it did not relieve the depression as well as the perphenazine-amitriptyline unless such depression was very mild in nature.

We think it is gratifying and noteworthy that perphenazine-amitriptyline particularly was able, in many acute situations of anxiety and depression, which were either reactive depressions or associated with acute somatic disease, to reverse these states far earlier than the original required protocol of eight weeks' treatment.

We noted in reviewing several case histories that there were some individuals with a diagnosis pointing to somatic illness which later, in response to psychotherapy with the perphenazine-amitriptyline preparation, proved to be emotional in origin rather than organic. One patient, in particular, a 59-year-old woman who had been treated for ulcers for many years, was completely relieved of ulcer symptoms after a few weeks of therapy with perphenazine-amitriptyline.

This is an interesting development which warrants further study.

In our opinion, perphenazine-amitriptyline is a superior preparation for the treatment of depression and anxiety occurring alone or as part of a situational or reactive depression or associated with organic disease.

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MASS CHEST EXAMINATIONS

The mass chest examinations, as routinely carried out hitherto, include important possibilities for further development with increased gain for the general health work. It is our obligation to utilize systematically and exploit by means of this method the valuable factors of early detection of such nontuberculous findings as pulmonary cancer, other tumors of the chest, sarcoidosis, certain occupational diseases, localized in the chest, and cardiovascular lesions. The improvements in question can be expected to increase the medical gain of the mass chest examinations many times over in proportion to the resultant increases in cost and labor. Beyond these broadened margins of the organizational and diagnostic side, the technical carrying out of the procedure is in need of improvements, which, with some good, will easily be achieved and will guarantee a much better gain of this important type of health work. The Future Role of Mass Chest Radiography in General Health Service. Carl Wegelius, M.D., Stockholm, Sweden, Dis. Chest, 52:3 (Sept.) 1967, pg. 289.

POLITICAL HINDSIGHT

But while Congress did not pass all the President's proposals intact, it enacted enough liberal legislation to qualify it as one of the most notable congresses of American history. A few leading Washington political analysts, such at the New York Times' James Reston and the Christian Science Monitor's Richard L. Strout, suggested Barry Goldwater as the second member of the dynamic duo responsible for the great liberal victories of the last two years. Reston called the 89th "the Goldwater Congress" and said that Johnson and Goldwater are "insupportable, even insufferable," when apart but that, together, they are "invincible." Reston justified this whimsy by arguing that the Democrats would never have picked up the 38 new House seats in the 1964 election which insured these liberal legislative triumphs if the Goldwater candidacy had not dragged so many Republican congressional candidates to defeat. Outnumbering the Republicans 2 to 1 in both the House and the Senate in the 89th Congress, the Democratic liberals were finally numerous enough to throw off the incubus of the Southern Democrats who had joined Republicans to thwart the liberal legislation.

L.B.J.'s "Great Congress": Rubber Stamp or Creativity? Science, 154:3749 (Nov. 4) 1966, pp. 620-621.



THE VIEW BOX-

By Leon Love, M.D.
Clinical Professor of Radiology,
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Fig. 1

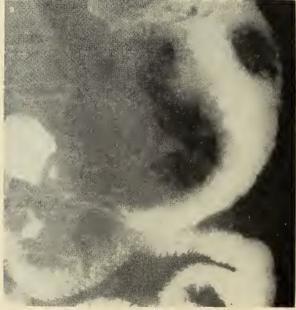


Fig. 2

---THE VIEW BOX-



Fig. 3

This 49-year-old white male entered with chief complaints of weakness, high fever, a 20-pound weight loss, and intermittent vomiting.

Physical examination revealed an acutely ill patient with an ill defined mass in the mid abdomen which was tender on palpation. Fig. 1, 2, 3.

What's your diagnosis?

- 1) Cecal volculus
- 2) Lesser sac abscess
- 3) Intraperitoneal abscess

(Answer on page 858)



Fracture Problems. Harris, W. H., Jones, W. N., and Aufrang, O. E. The C. V. Mosby Co., St. Louis, 1965.

This book is subtitled "Problem Cases from Fracture Grand Rounds at the Massachusetts General Hospital" and is based upon cases published as the "Fracture of the Month" in the Journal of the American Medical Association, from July, 1960, to July, 1964.

The book is organized strictly on a casepresentation basis and is divided into nine sections, eight of which are related to specific skeletal areas of the body, such as The Leg, The Femur, The Hip, The Spine, and concludes with a section on Pathological Fractures. The contribution of staff members with multiple talents is emphasized and is evident by the participation of surgeons from general surgery, plastic surgery, and urology, as well as orthopedic surgeons.

The case histories are carefully prepared and well edited. The pertinent material is presented succinctly.

Although most of the illustrations which depict the injuries are devoted to reproductions of x-rays, there are sufficient illustrations of the injured parts and five figures in color which enhance the text.

Sound basic principles are presented throughout. The necessity for preparation of the patient for operation is emphasized, including the need for tetanus immunizaton, antibiotic therapy, and whole blood to combat hypovolemia. There is a short but interesting discussion of fat embolism. The management of fractures in children is considered. Lumbar vertebral fractures in postmenopausal women is discussed.

The book should be of particular interest to orthopedic surgeons. However, there is a variety of information that should attract the attention of those interested in traumatic problems. It should be considered excellent collateral reading for residents in training.

John M. Beal, M.D.

CERVICAL SPONDYLOSIS AND OTHER DISORDER OF THE CERVICAL SPINE. Edited by Lord Brain, D.M., LL.D., D.C.L., D.Sc., F.R.C.P., F.R.C.S., F.R.C.O.G., F.R.S., F.F.R. and Marcia Wilkinson, D.M., F.R.C.P. Philadelphia, Penn.: W.B. Saunders Company, 1967, 232 pp.

This book was edited by Lord Brain and M. Wilkinson. The authors' interest in the problem of cervical spondylosis is well known by anyone versed on this subject. The book comprises 232 pages, including the index. Of these 232 pages, 87 are dedicated to anatomy and 25 to pathology. The remaining pages are occupied by the chapters on the history of cervical spondylosis and on the clinical aspects of the problem. It is obvious that this work leans heavily on the basic factors of spondylosis. The clinical sections, though authoritative, could be more detailed and less radically conservative. The reviewer thinks that the proposed conservative approach to treatment is too drastic: among other things the authors advocate the use of skull traction prior to deciding about direct surgical approach (pg 201)). The book has well chosen and well reproduced illustrations. It should be of interest to physicians that are interested in the complex problem of cervical spondylosis.

Edir B. Siqueira, M.D.

Preventive Ophthalmology: Glaucoma, Myopia, Amblyopia

By Abraham Schlossman, M.D./New York

Glaucoma-Myopia

Glaucoma is relatively common among myopes, and presents special problems in diagnosis and management. The spectrum of cases among myopes is somewhat different from non-myopes. True narrow-angle glaucoma is very rare among myopes. Glaucoma may occur among patients with congenital cataracts and retinitis pigmentosa, but only few such patients also have myopia. Chronic simple glaucoma with normal ocular rigidity may occur in myopes. Pigmentary glaucoma, glaucoma with prominent Schwalbe's line and extensive iris processes, and chronic simple glaucoma with low ocular rigidity are more characteristically seen among myopes, although even these types of glaucoma sometimes occur among non-myopes.

The difficulties in diagnosis are stressed. Low ocular rigidity, as well as myopic changes in the nerve and retina add to the diagnostic problems. The importance of applanation tonometry in these cases is emphasized. Special care must be taken in evaluating tonographic results. Care must be taken in interpreting visual field changes, because it is easy to attribute to the myopic processes that deterioration which is in reality caused by glaucoma. This is one of the reasons why management of glaucoma among myopes is so difficult.

The question of the tolerance of the myopic eye to increase in ocular tension is discussed, and it is suggested that it may be advisable to maintain such patients with lower ocular tensions than non-myopes, in order to prevent further field loss. The potential of the myopic eye to develop retinal detachment under miotic treatment must be borne in mind.

Amblyopia

Current clinical experience indicates that

we are dealing with separate and specific groups of amblyopias, each with a separate pathogenesis and demanding an individualistic approach.

1. Strabismic amblyopia is the reduced visual acuity that occurs in one eye in strabismic patients, without detectable organic pathology. The relative amblyopia of Bangerter may include some cases of strabismic amblyopia with apparently normal fundi but abnormal physiologic response to specific testing. Current theories favor active cortical inhibition secondary to the ocular deviation as leading to strabismic amblyopia. Eccentric fixation is the rule in this group.

2. Anisometropic amblyopia occurs mainly in eyes with a high degree of refractive differential i.e., high unilateral myopia, hyperopia and astigmatism, although some cases are found with differentials as low as 2.00D. No direct relationship occurs between the degree of anisometropia and depth of amblyopia. Foveal and cortical inhibition are thought to occur secondary to a binocular failure in unification of two markedly dissimilar images. Strabismus may be present as a secondary manifestation. Central fixation is often present.

3. Amblyopia associated with congenital cataract, corneal scars and other opacities (visual deprivation) has been referred to as amblyopia of disuse. Recent experimental work on kittens by Hubel and Wiesel have shown that both light and form deprivation in the first few weeks of life may lead to atrophy of associated cellular layers in the lateral geniculate bodies and loss of expected electrical responses.

Dr. Schlossman, who is clinical associate professor of ophthalmology at the State University of New York Downstate Medical Center, presented this paper May 24, 1967, at the Illinois State Medical Society's annual convention.

Although no such irreversible changes have been documented in humans, the amblyopia associated with congenital cataracts responds poorly to therapy. The amblyopia associated with bifoveal instability that can be alternated between eyes by switching patches falls into this group.

4. Amblyopia associated with aniridia, albinism and nystagmus may be due to macular dysplasia in some cases but may be due to visual deprivation related to blurred image contour and macular dazzle in others.

5. Essential amblyopia can be described as amblyopia occurring without any of the characteristics of the above groups. Essential amblyopia is therefore unexplained at the present time and may represent many etiologic types.

Diagnosis

A systematic and rational approach is mandatory in evaluation of any eye with decreased visual function. Most essential is the necessity of ruling out organic macular pathology.

In the pre-school group of patients where subjective responses to testing are lacking or are unreliable, amblyopia must be assumed in any unilateral squint or high unilateral anisometropia if the maculas are ophthalmoscopically normal.

In patients above five years old, tests to eliminate organic etiology include single letter visual acuity, dark-adapted visual acuity and color testing. In addition, specific patterns of eccentric fixation and response to Haidinger brushes and after-images are useful. Photostress testing or recovery time after macular dazzle can be an important differential test.

Systematic orthoptic examination should be performed to categorize any motor anomaly.

A careful family history in reference to strabismus or high refractive errors is essential.

Eccentric fixation can be easily diagnosed with the visuskop or similar instruments that project a target image onto the retina. Eccentric fixation is currently graded into central unsteady, parafoveal, paramacular and peripheral. Purely superior eccentric fixation 4 to 6 degrees above the fovea is usually associated with organic defect.

Occlusion

Occlusion can be used for prophylaxis,

diagnosis, and treatment. In general, occlusion therapy refers to patching of the fixing eye to stimulate the use of the amblyopic eye. Bangerter, however, introduced patching of the amblyopic eye as a preliminary to pleoptics. He termed this "inverse occlusion". The role of inverse occlusion in depressing fixation of the eccentric area has lately been questioned. On the other hand, it is more readily accepted by children than occlusion of the fixating eye, and may also serve as a preliminary to the conventional occlusion therapy.

Even before visual acuity can be ascertained, constant esotropia of one eye calls for atropinization of the fixing eye, or patching of this eye if feasible. Once the ability of fixation has been attained by the deviating eye, alternating patching is instituted. At first the deviating eye is totally occluded for one day, and the fixing eye is patched for six days. Gradually, over a period of time, the number of days for occlusion of the deviating eye is increased until the ratio of occlusion of one eye to the other is 1:1. The patient should maintain the ratio of alternating patching until surgery is performed. There is no real cut-off date for occlusion therapy, but it is usually difficult to institute a meaningful program after the patient's seventh birthday. Ideally, this treatment should begin before the patient attains the age of four years. Careful check of the fixation pattern of the amblyopic eye is essential. Before the age of four, a trial period of patching can be attempted regardless of the fixation pattern. If there is no improvement within one month, occlusion should be discontinued. Total occlusion for the entire day is the best method; but partial patching has its place. Alternate occlusion has merit in preventing the development of abnormal sensory adaptations.

"Einschleichokklusion" or "increasing fogging" was introduced in relation to pleoptics but has relevance to occlusion therapy only after the-patient has gained enough acuity not to require total occlusion. Occasionally, a patient, for example, with 20/50 vision in the amblyopic eye, does not necessarily need total occlusion of the fixing eye. Reduction of vision in this eye to 20/60, or 20/70, would suffice, and at the same time would maintain a certain amount of binocularity.

As originally described by Bangerter, (Continued on page 873)

The Community Medicine Program in Kentucky

BY HUGH S. FULMER, M.D. / LEXINGTON, KY.

INTRODUCTION

The Department of Community Medicine at the University of Kentucky College of Medicine is now in its seventh year of operation. Founded as one of the original departments of the new medical school, it has introduced a new teaching program into the undergraduate curriculum. The program, as judged by its very biased founders, has

been an overall success. I should like to present to you the history of the new idea, an outline of the teaching program, citing some of its attributes and some of its problems, some of the newer developments as the department has matured, and so induce your comments as to its overall relevance for medical education in general.

HISTORY

The idea that led to this teaching program began on the Navajo Indian reservation in Arizona about 10 years ago. At that time, responsibility for medical care of the Indians had been transferred from the Bureau of Indian Affairs to the U.S. Public Health Service. On contract from the U.S.P.H.S., a field health research project had been set up on the Navajo reservation by the Department of Public Health at Cornell under the chairmanship of Dr. Walsh McDermott. Dr. Kurt Deuschle, now chairman of our Department at Kentucky, was director of the Navajo project, and I served as field director. We gave direct medical care to the Indians, in order to warrant the conduct of our operational and epidemiologic research. Among other activities, we developed the concept of the Navajo health visitor, an all purpose health technician serving under the public health nurse, whose scope and effectiveness was thereby greatly increased. We also had assigned to us a series of senior medical students from Cornell. They had chosen this as an elective, and their assignment consisted of carrying out field research as well as engaging in clinical work. The *idea* that later led to the develop-

Dr. Fulmer, who is Professor of Community Medicine at the University of Kentucky College of Medicine, presented this paper May 23, 1967, at the annual meeting of the Illinois State Medical Society.

ment of our program at Kentucky was generated by the attitude of these students who said, in effect, that "if this is public health, we like it".

Thus, when Dr. Deuschle accepted the position as chairman of the new department and in a new medical school in Kentucky, he decided to see if he could create a teaching program which could stimulate and excite all medical students, not just a select few, to view medicine in its larger dimensions as these Cornell students had.

Kentucky Origins

Dean Willard, the dean of the medical school at Kentucky, gave ample moral and logistic support to the new venture. He wanted a strong department in the area of public health and preventive medicine, and he underwrote whatever Dr. Deuschle wished to do in order to bring that about. Thus, a liberal budget, ample space, adequate staff, and, crucially, prime curriculum time were made available for the new department.

What's in a Name?

The immediate question which arose was what was the new department to be called? When faced with creating a new department in a new medical school, in an area of study that has traditionally failed to fire the imagi-

nation of medical students throughout the country and the world, is choice of name important? We called the department Community Medicine. Why not preventive medicine and/or public health?

We felt that the broad definition of preventive medicine, which is now widely used, is merely good medicine. For example, the concept of the "five levels" of prevention implies that one is attempting always to keep the individual from getting sick or the patient from getting worse and to restore him to health. Although all clinical departments are not really teaching the concept wholeheartedly, they should be and many of them are. Certainly any good clinical teacher in a medical school should be teaching primary prevention as well as diagnosis, prompt treatment, and rehabilitation. Nevertheless in the hospital bedside situation it is difficult and often contrived to emphasize preventive principles in the face of the patient where diagnosis and treatment are the immediate concern. So that even when a clinical teacher wants and tries to teach preventive principles, he is stymied by the usual setting in the ward or even the clinic. Yet, to give a department the title Preventive Medicine fails to charm the medical student because he tends to see prevention as somewhat separate from the clinical areas.

Public health is a traditional and meaningful term, but it also has a negative connotation among medical students. How many of us became inspired by the field of public health in medical school by virtue of the teaching that was done by a department with that name? In my own class at a school of public health, we surveyed ourselves and found that virtually the entire physician group became interested in public health several years after medical school. As medical students, we have in the past come away perpetuating the dichotomy between public health and the "mainstream" of medicine.

We have thought of public health as a "poor second cousin" populated by those who couldn't make it in the "real" world of medicine. And this thinking has been greatly influenced by poor teaching programs in many medical schools. Most importantly, however, the definition of public health includes, traditionally, only *organized* effort to solve community health problems. It does not encompass what the practicing physician might do as an individual and, since most medical students do go on to become private practitioners, they tend to look upon public health as separate or peripheral to their interests.

Social medicine might have been an adequate term, but in Kentucky this might not have been acceptable; we were concerned that there might be confusion with socialized medicine!

But what were we really trying to do by creating this new department? We were attempting to complete the educational evolution of the medical student. This was to be done by embracing the third major step of medical education which was conceived to consist of laboratory, clinical and community medicine. We felt that the third step was lacking in most teaching programs. If the student learns the application of the basic sciences in the laboratory, and the application of the clinical sciences at the bedside, then the analogy is that he learns the application of the scientific approach to the community in the community. And in the community, there are not only groups of people, there are individuals. Therefore, in a sense the concept includes public health and preventive medicine and social medicine and clinical medicine. The important point is that the definition is a functional one. The student learns about the "real world" of medicine by having personal confrontation with its health problems, individual and group, in the community. Hence, the choice of the term "Community Medicine".

TEACHING PROGRAM

The major objective of the Department of Community Medicine has been to teach a clinical approach to the identification and solution of health problems of populations or communities. To carry out this objective, faculty equipped to teach and conduct research at the clinical, laboratory, epidemiologic, and public health level have been recruited. Currently the professional staff consists of three internists, three pediatri-

cians, two general practitioners, one medical social worker, and one medical anthropologist. There are four laboratories: mycology, tuberculosis, virology, and genetics. In addition, we are developing the "field professor" idea which will be mentioned later.

The curriculum taught by our department, which all students are required to take, consists of a 72-hour course in the sophomore year and a six-week Kentucky

community clerkship in the senior year. The sophomore course is comprised of a three-hour session held once a week for 24 weeks; it emphasizes epidemiologic principles and methods in both infectious and chronic disease problems, using a combined lecture-seminar approach.

Senior Clerkship

The senior clerkship places every senior student for six weeks in a Kentucky community, throughout the state, the locus varying from urban to rural, north to south, east to west. He is assigned to work under a physician. However, the student is not in an orthodox preceptor relationship with that physician but rather is assigned through him to study the total health of the community. This includes a variety of interrelated tasks. The student observes the practice of medicine, how medical records are kept, how the physician works up patients and refers them. He has the opportunity to compare the pattern of disease as seen by general practitioners as contrasted to specialists and as seen by the health department. He contrasts the disease problems in the community with that in the University Hospital.

He observes the functioning of the local medical society and how physicians cope with the problem of continuing medical education. He observes for the first time the way a community hospital is organized, financed and managed. He learns about the local health department and its activities, including the functions of the public health nurse, the sanitarian, the health educator, etc. He attends meetings where health is a matter of concern to voluntary agencies and local citizens' clubs. He visits local industries and investigates occupational health problems. He confers with community leaders who have even a peripheral concern with health; thus most are included.

Four-Fold Approach

In order to carry out this task, the students use a four-fold approach. First, they work up individual patients in the physicians' office practice. Second, they conduct a number of family studies in the home to observe the relationship of the immediate environment to health and disease problems. Third, they utilize a guide prepared by an expert committee of the W.H.O. and modified by us which outlines how to study the health of a local community. And fourth, they con-

duct an epidemiologic study on some particular disease or health problem in the community. These studies may be modest, but they serve to emphasize the scientific approach in attempting to answer a specific question or questions about a community health problem. In so doing, the student develops an appropriate design, obtains a proper sample if possible, and conducts the study, which may require physical exams or simple field tests, such as tuberculin testing or vitalometry. Finally, he writes up all of this material and presents it before his colleagues and the faculty during a seminar week.

In order to emphasize the appropriate approach to his community studies, each student is visited by a full-time faculty member from our department at least once a week while in the community. Thus there is a teaching-learning triad—student, local physician, and community medicine faculty member.

Activity Outside Hospital Walls

The locus, then, of community medicine teaching activity is outside of the hospital walls, in the community. By developing a comprehensive report on the local health situation, studying a variety of community medical problems, and conducting epidemiologic projects, the students and the faculty develop much useful information about the community. Many contributions have already been made to state and local health departments as well as other interested medical groups and voluntary health agencies; some studies have been published.³⁻⁶

Another important benefit has been the opportunity for Kentucky communities to become acquainted with the upcoming medical graduates of their state university. As taxpayers they have been committing funds to the development of the medical center; now they may see the embryo physician just months or weeks before he receives his M.D. degree. Some communities have "courted" the medical student, offering him inducements to practice there. By the same token the medical students have had their eyes opened to opportunities of family practice and public health in a way that they could never have experienced at the medical center. They have developed a new respect for the practicing physician and for the importance of public health in the community.

Sick Community Like Sick Patient

It may be asked how the students learn good medicine in an outlying community when the model could be a horse-and-buggy approach from a bygone era. How can good habits be derived from seeing the operation of a decrepit health department and an overworked general practitioner in a setting of poverty in the midst of Appalachia? The answer is that a sick community, implying stunted health resources in the face of tremendous medical need, is to be diagnosed by the student, just as a sick patient is at the bedside. The more acute or chronic the illness, the greater the potential challenge for the community minded student. He attempts to propose solutions to some of these problems as if he were in a position to do so. True, some students are depressed by what they observe. But we are convinced that the educational process is enhanced by such exposure so long as our supervision is optimal.

The medical students in some respects have the ability to promote developmental change in the health area. In asking pointed questions about health services and unmet medical needs, they have precipitated discussion and action in the community after departing. They might be looked upon as "change agents" in a kind of University Medical Center extension service program.

Supervisor Carefully Selected

This is not to say at all that students are deliberately placed in situations where medicine is practiced poorly. We select the local physician supervisor with great care. We find that it takes a rotation or two for him to understand what our teaching program is striving to do, but we have found an enthusiastic acceptance of the concept by our "field faculty". Each year we have a meeting at the medical center with the entire group, consisting now of about 100 physicians, during which we discuss the pros and cons of the program. They are quite positive about the worth of the program for them. Often it has acted as a stimulus for renewed interest in the Medical Center as a state resource. The distribution of student assignments is such that a given community does not have to absorb more than one student per year, except the urban areas where the syndrome of the "tired community" (tired of students asking embarrassing questions) would not be anticipated to be as much of a potential problem. It should be mentioned that most of the field faculty are family physicians, but the whole range from specialist in ophthalmology or surgery or internal medicine to health officer to industrial physician is represented. This may be the students only opportunity to view the family physician "in situ". And, to reiterate, he often likes the idea of what he sees, contrary to his university hospital concept of the family physician.

International Clerkship

In addition to the community clerkship in Kentucky, our department offers an elective in international Community Medicine.^{7, 8} In the fourth year, there is a 12-week elective period, and each student must elect to pursue some subject during this period. Our international clerkship has been offered each year that we have had senior students, so that this is the fourth year.

Its aims are parallel to that of the Kentucky clerkship. In addition, it provides senior medical students with an opportunity to live in a community in a developing country. Then through participation in clinical, preventive and community medicine he learns to appreciate the country's overall health problems, the many inter-related factors responsible for these problems, and means by which they could be solved. The experience adds depth to the student's medical education which ought to be of value in whatever type of practice he ultimately chooses.

How do we select the students? Thus far we have had applications from about half of each class. Early in the junior year we interview all of those who are interested. Then based on a review of the record so far in medical school, and intangibles such as attitude and character, and motivation for the program, we attempt to select the best qualified students. It is highly likely, though, that a number of equally qualified candidates are not chosen. But we have the problem of numbers and some good students are therefore excluded.

Language Instruction

Having chosen the group that is to go, we then arrange for an introductory course in Spanish for those who are to go to Latin America. As yet this has not been sufficient to enable them to speak fluently or well when they reach the foreign site, but it has provided a necessary background upon

which they have been amazingly successful in developing further skill while there. In addition, readings are assigned on the geography, history, politics, culture, etc.

The blueprint for the clerkship is the same as for the Kentucky clerkship, that is, patient and family workups, community, and epidemiologic studies under the immediate supervision of a faculty member of the foreign medical school, but with guidance by letter, infrequently by visit, from our staff.

A prerequisite to the overseas clerkship is that the student must have taken the sixweek clerkship in Kentucky first. Thus he has developed an ability to approach a community and effectively analyze it. Administrative details such as provision of immunizations and visas are arranged through our department.

These clerkships have been exciting and stimulating to the 25 students who have

taken them. It is too early to say what they have meant with respect to their total medical education.

Summer Fellowship

During the past two years we have developed a large departmental summer fellowship program. In the summer of 1966, 45 students were involved in epidemiologic projects that were under the guidance of the faculty. Students from other medical schools, and members of the incoming freshman class were included in the group. The program provides an extra stimulus by involving students in community health studies early in their medical education. They learn application of epidemiologic principles and biostatistical techniques, and are encouraged to look at medicine in broad terms.

PROGRAMS IN DEVELOPMENT

There are a number of important challenges in further developing the teaching and research programs in Community Medicine. These include the new residency programs, the supervision of an expanding number of medical students, the field professorship concept, and the problem of evaluation.

Residency Programs

An experimental community medicine residency program was launched during the academic year of 1964-65. A resident physician was given a series of both class room and field assignments to enable the department to measure what might be most valid for a formal residency program. The new residency is aimed at replicating community medicine faculty. The program has been officially approved. As a measure of interest, we have received applications from five members of last year's graduating class.

A family practice program is being developed by the Department of Medicine in collaboration with the Departments of Community Medicine, Pediatrics and Psychiatry. Family practice residents will be rotated through a substantial block of time in community medicine.

Logistical Problem

A major problem in teaching community medicine is the time involved in supervising students in the field. Although almost twothirds of the state's population can be reached within two hours' automobile travel from Lexington, there are many interesting communities in the furthermost reaches of eastern Kentucky and throughout the western half of the state which require long arduous drives. With improved roads, travel time has been cut significantly. Moreover, there is an increasing number of airports throughout the state which permit travel by air. Nevertheless, the travel problem is an important one.

This is compounded by the increasing student-faculty ratio. The first senior class (1963-64) consisted of only 32 students, but the field program is now operating with a full complement of 75. There is discussion about expanding the entering medical student classes from 75 to 100 per year. To insure close supervision from the faculty for the community experiences experiments have begun testing the concept of the "field professorship". Currently two people who hold academic positions in the department conduct teaching, research, and service programs in their local communities.

Field Community Medicine Professorships

A unique community teaching research program was recently established in Madisonville, Ky. Here, under the sponsorship of a private practice group, the state Health Department, and the Department of Community Medicine, a field Community Medicine Professorship has been set up. The physician who occupies this position serves as health officer, clinical epidemiologist, and participant in private group practice. In his combined role he makes the community population accessible to medical students and to residents in Community Medicine. Thus a continuous study of a population is insured and fresh ideas for solving community health problems are anticipated. Such field faculty can obtain expert consultation from the faculty in Community Medicine as well as the staff from the entire medical center. Acadamic, private and public health medicine are thus amalgamated. Over the next five years it is anticipated that there will be one field faculty professorship for each twenty county area (Kentucky has 120 counties).

A second community medicine professorship has been established in conjunction with a community college in Somerset, Ky. The physician in this role in the community college teaches students sent to that area for their clerkship, and coordinates the activities of our academic department with those of the practice of medicine and the health department in the community. He is currently developing an academic program for health technicians who would serve as "all purpose" aids for family physicians.

The field professor may be viewed in the same light as perhaps the medical educator in the community hospital. The latter program is often headed by an internist or pediatrician who supervises the internship and the residency program, makes continuing education programs available and in general conducts the teaching and research programs for the community hospital. In the case of the field professorship, the 20 county area may serve as the community laboratory in which the professor would maximize teaching and research opportunities, providing a liaison to the medical center and its resources for teaching, research and service.

Evaluation

One of the most difficult problems has been to develop effective evaluation mechanisms for determining what effect the teaching program has had on education, attitudes, and career choice. For the initial phase of the teaching experiment, enthusiastic acceptance by students, medical center administration, and faculty was deemed the most

obvious and vital guide to success for the program.

The second and fourth year students are surveyed after they take the courses, to solicit constructive criticism and check their attitudes, skills, and ability to consider broad problems in epidemiology, public health and medical care.

We have used the video tape method in our evaluation attempts wherein the senior students review their community clerkship experiences at the conclusion of the sixweek period. These have generally been helpful in pointing out strengths and weaknesses of the structure of the program. They are quality appraisals only and by nature cannot be quantitated. Ultimately we will want to survey our graduates five and ten years hence although-alas!-we have no control group. We have employed both the depth interview and the before and after structured questionnaire technique in attempting to evaluate our international clerkship. Both have value; neither tell us what we ought to know which will have to await the passage of several years. We must admit that our efforts at evaluation leave much to be desired; we do endeavor to keep a critical attitude toward how we are attempting to carry out our program and thus to remain flexible as we plan for the future.

SUMMARY

During the seven years since the establishment of a Department of Community Medicine, constant experimentation in teaching has been in progress. The major aim of the department, to "educate students in the identification and solution of health problems in communities or population groups," has remained constant. Thus, the departmental responsibility to bridge the medical school and the state-wide community has fulfilled the original philosophical goals of the founders of the University of Kentucky College of Medicine.

A public health oriented clinical faculty has been involved in a wide range of teaching activities including a 72 hours basic epidemiologic course in the second year, a six-week community clerkship in the senior year, optional summer fellowships and three month electives in Kentucky or abroad.

The hallmark of the field teaching program has been to involve the student in the

(Continued on page 858)

The ISMS Tax-Qualified Retirement Program

How Amended Keogh Act Helps Physicians

By Marvin Schroder

An amended Keogh Act has excited new interest among physicians and other selfemployed individuals. Approved in 1962, the Act made possible effective retirement planning for the self-employed. Unfortunately, the tax breaks expected under the Act fell far short of expectations and a few physicians joined tax-qualified retirement programs. However, amendments approved last year-to be effective in 1968 -have dramatically boosted the law's tax advantages and brought a flood of inquiries from interested physicians. To learn more about the amended Act, and its implications for doctors, the ISMS Division of Public Relations and Economics interviewed Paul H. Robinson, Jr., administrator of the ISMS Tax-Qualified Retirement

Mr. Robinson, just what is the Keogh Act?

Basically, it's an act designed to give the nine million self-employed persons in the country an opportunity to participate in a tax-qualified retirement plan.

What do you mean by a "tax-qualified" retirement plan?

It's a plan under which funds set aside for retirement purposes are deductible from one's net earned income. The retirement funds are invested and accumulated earnings from the investments are not taxed until a person retires and begins drawing retirement benefits. Plans of this nature have long been available to employees of corporations, trade unions and government agencies.

How long has ISMS sponsored such a plan for its self-employed members?

Since December, 1964. That's when the Internal Revenue Service approved the ISMS plan as being fully-qualified under provisions of the Keogh Act.

Mr. Robinson, ISMS also has a Re-

tirement Investment Program for its members. What has that program to do with its Tax-Qualified Retirement Program?

Nothing. The two plans are entirely separate in their administration and provisions. Both utilize a group annuity and a common stock mutual fund, but that's where the similarity ends. The Retirement Investment Program's purpose is to provide physicians with an opportunity to participate in a reduced cost retirement plan without including his employees.

Under the Tax-Qualified Retirement Program, how much can an individual contribute to his retirement?

His annual contribution is limited to 10 percent of his net income from his practice or \$2,500, whichever is the lesser.

And how much of that contribution is tax deductible?

In 1967, as in all previous years since the Keogh Act was passed, the self-employed person may deduct half of the contribution made on his own behalf up to a maximum of \$1,250. However, beginning Jan. 1, 1968 a self-employed physician may deduct the full amount of his contribution—up to \$2,500 in any one year. It's this new provision that has prompted many physicians to take a second look at the Keogh Act.

What does the Act say about retirement programs for employees of selfemployed persons?

It states that any self-employed person who establishes a tax-qualified program for himself must also establish one for each fulltime employee with three or more years of service. A fulltime employee is defined as one who works at least 20 hours a week over a period of five months out of the year. The employer makes the employees' contributions to the retire-

ment fund—and those contributions must be on a scale proportionate to the contribution he makes toward his own retirement. For example, if he sets aside 10 percent of his net income for himself, he must also set aside an amount equivalent to 10 percent of his employee's income. If he puts aside five percent for himself, he must put aside five percent of the employee's salary.

Are contributions to an employee's retirement program regarded as a business expense?

Yes they are, and as such, they are fully deductible on the employer's income tax return.

Is it possible to contribute more than \$2,500 a year to the retirement fund?

It is, provided the employer makes it possible for his employees to also make additional voluntary contributions to the retirement program. Let me point out, however, that these additional voluntary contributions are not tax deductible. In effect, they are paid with "after tax" dollars. However, earnings on these dollars will accumulate in the program tax-free until they are distributed at retirement.

May a person vary the rate of his taxdeductible contributions from year to year?

No—unless the plan is amended. That's why careful thought should be given to what rate is established in the first year. The employer, by a predetermined formula, pledges to contribute a fixed percentage of profits or earnings.

Wouldn't the cost of providing coverage for several employees offset an employer's annual tax saving?

The answer to that question depends on a self-employed physician's circumstances. The net tax gain or loss is contingent upon the relationship between the self-employed's income tax bracket, the amounts contributed to the retirement plan and the permissable deductions. Say that a self-employed person with employees finds that the ratio between his income and the salaries of his employees is such that the maximum 10 percent investment is economically unsound for him. He may find that by reducing his basic, tax-deductible contributions to five percent, or even one percent, he is able to effect a long-term tax

savings— while at 10 percent he would be taking a loss.

But wouldn't that result in a slow growth of his retirement fund?

Not necessarily. He could still make a supplementary, non-deductible contribution to his fund up to the maximum amount allowable—and the earnings from this investment wouldn't be taxed until they were paid out as benefits. Of course, all other participants must also have the right to contribute.

When are the benefits payable?

For the self-employed person, the invested funds aren't available until age 59½, but distribution of benefits must begin before the age of 70½. Of course, benefits may be paid at any time in the event of total and permanent disability and are payable immediately in the event of death. Let me add that any voluntary non-deductible contributions can be liquidated to the



Paul H. Robinson Jr.

full dollar amount at any time, but the law provides for penalties if the regular contribution is liquidated before age 59½. Now in the case of employees, their benefits are paid upon retirement, death, disability or termination of employment. The employee's age is not considered.

How are contributions to the Society's program invested?

They can be invested in a group annuity and in shares of a "no load" common stock mutual fund, in any ratio as designated by the participant.

What investment media does the ISMS plan use?

The group annuity is issued by Continental Assurance Company of Chicago and the mutual fund is Stein Roe & Farham Stock Fund, Inc. It's up to the individual to say how much of his yearly contribution he wants to allot to each. The trustee for the entire program is the Continental Illinois National Bank and Trust Company of Chicago.

Just what are the Trustee's responsibilities?

Well, there are several, including the receipt of contributions and the allocation of the investments to the insurance company and the mutual fund. The trustee also does the bookkeeping for the accounts of all participants, prepares annual statements, files the information returns required by IRS, and issues the distribution checks for the payment of benefits. For this, the trustee receives a \$3 acceptance fee and an annual maintenance fee of \$8.50 from each participating physician.

What is ISMS's role in this program?

The society has selected the insurance company for the group annuity is purchased and the mutual fund after years of

competitive bidding to make available to the membership a program with advantages that an individual physician could not otherwise obtain. It has determined the fees to be paid to the Trustee and it has the power to remove the Trustee and designate a new one. It has the right to amend the plan and to interpret its provisions.

What does ISMS charge its members for participation in the plan?

Nothing. The society makes the plan available to any individual who is an ISMS member, or to any partnership which has at least one partner who is an ISMS member.

Does the current value of the annuity always equal the amount that a participant has deposited?

No. As with any annuity program, values increase at a greater rate with each year of participation. However, when the participating member reaches retirement age, the current value of the annuity will be greater than the total amount deposited by him.

Where may interested physicians obtain further information about the Society's program?

If they will address their requests to me, I will see that they receive full information. Address correspondence to: Paul H. Robinson, Jr., Board of Trade Building, 141 West Jackson, Chicago, 60604.

AUTOMOBILE SAFETY

Children automobile passengers are best protected if the smallest child rides in a specially adapted backward-facing seat next to the driver and other youngsters are placed in the rear, seated close to the back of the front seat, says a Swedish expert on traffic safety. Safety belts for children and forward-facing child seats could mean increased risk of serious injuries in case of accident. The findings were made by Dr. Bertil Aldman, assistant professor of traffic safety at the Karolinska Institute. His tests, conducted at the Medical Research Laboratory of the Institute, were reported in an article in Svenska Lakartidningen. A child seat facing to the rear offers small children protection equal to that given by safety belts to adults, and experience has shown that children can easily adapt to riding backward.

The seat used in the tests had a steel tube frame covered with heavy sheet aluminum or spot-welded iron plate with reinforced back. It was padded with about two-and-a-half inches of foam plastic and attached so that it was stopped by the instrument panel in case of accident. Further it was attached to the floor by a safety belt. Some 20 different safety belts for children have been tested and most of them broke at comparatively low speed, Dr. Aldman reported. As a rule they did not pass tests equivalent to a collision at 30 miles per hour.

Backward-facing Car Seats for Children. World Med. Jl., 13:5 (Sept.-Oct.) 1966, pg. 135.

SOCIO ECONOMIC news

A service of the Public Relations and Economics Division

Malpractice Nuisance Suits Reduced in Florida

How can the profession combat the nuisance malpractice suits which plague doctors and send professional liability insurance premiums soaring? One effective way is through the type of program which the Florida Medical Association has developed with the carrier of its basic malpractice insurance plan. In an attempt to discourage such claims, the carrier agreed to fight all nuisance claims -despite the cost. It also agreed not to settle a claim without the accused doctor's written consent. In return, FMA agreed to sponsor the carrier's plan, and to help the company defend claims by providing expert witnesses and medical advice when called upon. The result? A noticeable decrease in nuisance suits filed against physicians covered by the plan. Possibility of establishing a malpractice insurance program similar to the FMA plan is now under study by the ISMS Medical Economics Committee.

Chicago Medical School Plans University of Health Sciences Chicago Medical School revealed plans to spend \$125 million over the next several years to develop its new University of Health Sciences. The university will train students for 12 new types of jobs designed to relieve physicians from time-consuming routine tasks. In addition, the medical school hopes eventually to expand its enrollment of medical students from the current level of 72 per entering class to 200. Construction will start next summer on a basic sciences building and another six to eight buildings are planned. Chicago Medical School President Dr. Walter Wiggins will also serve as president of the University of Health Sciences, which has been described as "a new concept in medical education."

Illinois Hospital Association Denounces Nurses' Strike Nursing service personnel at Sterling's Community Memorial Hospital returned to their jobs after a 28-day walkout in a labor dispute. The nurses seek recognition of the Illinois Nurses' Association as their bargaining agent, and a starting salary of \$540 a month for registered nurses. The Illinois Hospital Association was strongly critical of the nurses. IHA told the Sterling Gazette "For nurses to strike over an issue of employee representation is an action that disregards the interests of the hospital's patients and the public at large. . . . it is our belief that collective bargaining procedures, or attempts in that direction, which take the course of disrupting the furnishing of hospital care must be viewed as completely contrary to the public interest."

Illinois Nurses' Salaries Show 20 Percent Increase

Average starting salaries for day shift registered nurses in Illinois hospitals increased 20 percent in the 12 months ending last June. A survey by the Illinois Hospital Association shows that the average monthly salary for RN's in June, 1966, was \$398. By June, 1967, it had increased to \$477 a month.

Medicare Payments Average \$175 Per Person in First Year

Per capita payments averaged \$175 for every person enrolled in Medicare in the program's first year, the Social Security Administration reported. The first detailed statistical analysis of the program showed that reimbursement averaged \$481 for an in-patient hospital claim and \$71 for a medical bill. The average daily charge for general hospitals was \$46 and the average length of hospital stay was 17 days. There were 5 million Medicare admissions to nearly 7,000 hospitals, and about one of every 12 persons hospitalized went on to an extended care facility.

Nixon Presidential Choice In ISMS Straw Poll

Richard Nixon will be the next President and Sen. Charles Percy (R., Ill.) will be his Vice President. At least, that's the way the vote went in a straw poll taken at the ISMS Public Affairs Conference in Chicago last month. Nixon pulled 50 percent of 116 votes cast for President, while Senator Percy won 33 percent of the 103 votes cast for Vice President. Gov. Ronald Reagan of California had 23 percent of the Presidential votes, Gov. Nelson Rockefeller of New York had eight percent and President Johnson received seven percent. Conference participants, asked to name the three major issues in the 1968 Presidential election, selected the Viet Nam war, government fiscal policy and civil rights.

Budget Totaling \$40.6 Million Approved for U. of I. Medical Center

The University of Illinois Medical Center in Chicago has received approval of a budget of \$40,649,720 for fiscal 1967-68. State tax revenues will provide \$26,167,344 of that total, while the remaining \$14,482,376 must be raised from private gifts, state and federal contracts for instruction and research, endowment income and income from auxiliary activities. The new budget is up 15.2 percent over the 1966-67 budget.

* * * * *

California has the largest number of veterans of the 50 states, 2,749,000. New York is second with 2,445,000 veterans and Pennsylvania third with 1,684,000 veterans. Other states with more than one million veterans are Illinois, 1.48 million; Ohio, 1.43 million; Texas, 1.28 million; and Michigan, 1.09 million, the Veterans Administration reports.

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THE UNITED STATES – TOPS IN RESEARCH AND FIFTEENTH IN MORTALITY RATE

The United States has an infant mortality rate higher than 14 other countries. This is the report of a detailed county by county survey conducted by The U.S. Department of Health, Education and Welfare and The Children's Bureau under a grant to George Washington University.

Less than 2 per cent of all counties in the United States account for one third of the excessive mortality rate. The counties include all but one city with over 500,000 population. This indicates that poverty in the big city with associated inadequate nutrition, poor education, teenage pregnancies, and high incidence of low birth weight is the major cause of the high mortality rate of 24.8 per 1,000 live births in the United States. HEW stresses that the high mortality rate is not due to race but to poverty. If the nonwhite infant mortality was left out, the nation's death rate would still be more than the death rates for 12 other nations.

What does this mean for the State of Illinois? Cook County was included in the 56 counties with an excessively high mortality rate. The mortality rate for Cook County for 1966 was 27.6 deaths per 1,000 live births. The mortality rate for the entire state of Illinois for 1966 was 25.4 deaths per 1,000 live births.

What is being done to reduce the mortality rate in Cook County? The Children's Bureau has opened several clinics in Cook County giving special care to mothers and infants of high risk pregnancies in the low income neighborhoods. These projects were authorized under the 1963 National and Child Health Mental Retardation Planning Amendments for counties with the highest mortality rates. These are usually run by the heads of pediatric departments of the medical schools. Intensive care nurseries should be established in all hospitals especially those serving the poverty areas in the large cities with excessively high mortality rates. Infants of high risk pregnancies would be given special nursing care as that received in the premature nurseries. Better medical communication between anesthetists, obstetricians, and pediatricians, nurses and social services is needed in all hospitals to improve the care of premature infants and the infant of high risk pregnancies.

But improved health services are not enough. The problem of reducing the number of pregnancies in teenage mothers still remains. The incidence of low birth weight infants in this group is much higher than the national average. The unwedded, teenage mother is often reluctant about attending private clinics and accepting information on family planning or contraceptive devices.

Dr. Arthur Lesser, deputy chief of the Children's Bureau stated that a combination of improved health services and more research is only part of the answer to the problem of infant mortality. Improved housing and nutrition, better education and communications and more social welfare services

are also needed to effectively reduce the excessively high mortality rate in the United States.

This is an expensive set of proposals. We must make every effort to carry out this program if we are going to affect a significant reduction in the high infant mortality in our state.

Harvey Kravitz M. D.

PROGRESS IS WONDERFUL

In Supplement 11 to Circulation, October 1967 issue, there appear abstracts of articles to be read at the San Francisco meeting of the American Heart Association. Many of the papers are highly scientific rather than clinical and with each decade of mileage on the life of your editor, the reports become increasingly difficult to understand. It is embarrassing to sit next to a younger colleague who is excited and even enthusiastic about the outcome of a highly technical research project. By the same token, it is heart warming to mention the topic to a contemporary who replies, "I didn't understand it either."

The following abstract may not be a typical example but illustrates what we mean. The title: Effect of Clofibrate (CPIB) on Liver Lipids and Serum Lipoproteins in the Rat. For the purpose of my report, the authors and origin of the research will be anonymous.

Male rats (20 per group) were fed CPIB (0.25% of diet for 21 days) and liver and serum lipids determined (mean \pm se given). Liver (in mg/liver): cholesterol (\triangle ⁵), control (C) 19.4 \pm 0.6, CPIB treated (T) 22.2 \pm 0.7 (+ 14%); phospholipids (PL), C 14.0 \pm 0.5, T 22.3 \pm 0.6, (59%); triglyceride glycerol, C 6.5 \pm 0.6, T 8.4 \pm 0.7 (+29%); liver weight, C

11.47 ± 0.43 g, T 15.02 ± 0.55 g (+31%). Serum (in mg/100 ml): \triangle^5 , C 69 I 1.9; T 45 ± 2.6 (−34%); PL, C 137 ± 4.0, T 107 ± 3.0 (−22%). Serum lipoproteins (LP) were separated with dextran sulfate (DS) and by ultracentrifugation: CPIB reduced the lipids (in mg/100 ml) in (A) fraction with d < 1.019 (\triangle^5 , C 34.7 ± 1.7, T 22.4 ± 2.2; PL, C 56.4 ± 1.4, T 49.2 ± 2.6), (b) fraction with d, 1.063-1.21 (\triangle^5 , C 23.5 ± 1.0, T 12.0 ± 1.1; PL, C 57.6 ± 2.7, T 36.6 ± 3.1), and (c) low-density LP precipitated by DS (\triangle^5 , C 46.5 ± 1.0, T 24.3 ± 0.6; PL, C 66.1 ± 2.7, T 45.2 ± 2.1).

After injection of (³H) leucine and (¹⁴C) choline to rats fed CPIB, no change in specific radioactivity was noted in liver protein (³H/N) and in liver and serum low-density LP phospholipids (¹⁴C/PL). This, coupled with elevated lipid content in the liver and lowered lipid levels in the serum, suggests an effect of CPIB on rat serum LP synthesis.

In vitro, following simultaneous incubation with liver homogenates from rats fed CPIB, incorporation in \triangle^5 was blocked from (3 H) acetate (93% inhib.) and unchanged with (14 C) mevalonate.

T. R. Van Dellen, M.D.

HIPPIELAND CLINIC CLOSED

According to the Medical Tribune, the three-month-old hippie clinic in San Francisco has closed its doors.¹ The Haight-Ashbury Medical Clinic was founded last June by a group of 30 unsalaried physicians and 40 nurses. Their budget (\$4,000 a month) came from the volunteers' personal funds or from those of friends.

The clinic served more than 10,000 young hippies – 100 to 200 a day, Dr. Robert Morris, Children's Hospital pathologist, the

guiding force behind the plan, was quoted as saying "We're broke and exhausted". In his opinion, this unusual medical team served a critically important duty, but it could not continue without community support. We understand that hippies cost the City of San Francisco \$45,000 monthly for medical services, mainly psychiatric in nature.

(Continued on page 844)

The President's Page

(Continued from page 792)

Organized labor and the health planners are determined to re-establish their control of the Congress and improve their grip on both Washington and the Illinois General Assembly with each election. Unless physicians resolve to continue and intensify their support for candidates who share their views, the ground we have gained will be lost and the health planners will again be in a position to determine the conditions under which Medicine will be permitted to practice. To prevent this from happening, IMPAC needs the support of all those who have a desire to see quality medicine maintained.

There should be no hesitancy about your contribution to IMPAC. Its objectives are in your best interests. IMPAC is truly bi-partisan and supports candidates of both political parties. These candidates are selected on the basis of the individual—his programs and principles—not party affiliations.

IMPAC is directed by a 30-man Council which is elected from the IMPAC membership at large during the ISMS Annual Meeting and is representative of the political structure of the Illinois medical profession both geographically and philosophically through its membership's views.

With the federal government alone spending \$11 billion annually on health care, we find ourselves deeply involved. We need to be greatly concerned with the capabilities of those who determine the nature and extent of these programs. We can stay out of politics when politics stays out of medicine!

We have found in our legislative work that supporting candidates who sympathize with our views and programs is the only really effective way to see that legislation dealing with medicine is passed or defeated as the interests of the health and wellbeing of the citizens of Illinois would dictate.

It is infinitely preferable to support candidates who are in accord with the views of medicine than it is to attempt to influence legislators after they are elected to an office (especially when we have not contributed to the success of the victors!)

Without support from groups like IMPAC, the opportunity for independently

motivated men to run for political office would be considerably diminished.

Your "insurance policy" is low in cost and high in value to you and to the preservation of your chosen profession. Combined regular membership in IMPAC and AMPAC is \$25; a sustaining member category is available at \$199; and Auxiliary membership is \$20. When returning your 1968 medical society dues please make sure you honor the voluntary contribution for IMPAC/AMPAC. This will give you the "basic coverage."

During the 75th General Assembly in Springfield we were concerned with over 270 individual pieces of legislation. We were successful in amending some 60 bills to improve the quality of medical care. We were involved in 145 individual roll call votes on the floor and in Committees which totaled over 7,000 yea or nay votes. It should be made perfectly clear that IMPAC funds are not given with the idea that it will "buy" a particular Representative or his vote. This cannot be done! IMPAC funds do, however, establish a rapport with the legislator which demonstrates to him that you "cared" at a time when he needed you. Only then should we expect him to be interested in medicine's story. We ask only for a member of the legislature to listen, in good faith, to the facts we have to present. Due to the soundness of our position on the majority of issues, we are persuasive.

In these times of massive social change we can be certain that many new health care bills will pass through the legislatures. We must make certain that these bills are drafted and controlled by as many friends of medicine as possible.

In the arena of competing interests, we cannot expect any special devotion from a member of the legislature if we did not think enough of him to help him during his campaign effort. It is the elective process that maintains good government. If this is what we truly want we must take a leadership role in seeing that the candidates, when elected, are those who will seriously consider the views of medicine when making a decision on health related legislation.

(Continued on page 844)

The Physician And The Protestant Religion

By PASTOR MALCOLM B. BALLINGER/WILKINSON, IND.

There are wide differences in the doctrines, the form and conduct of worship services, the administration of Sacraments and Ordinances, and concepts of proper ministrations to the sick among the denominations classified as Protestant. The many groups included under the term "Protestant" can be classified in different ways: as to polity ("gathered churches" vs churches with centralized governments), doctrine (conservative vs. liberal), worship, (liturgical vs. nonliturgical, "personalistic" vs. "legalistic," etc. In general, however, we may classify them under the following four broad heads:

1. Nonliturgical denominations. The chief representatives of this classification are the Assemblies of God, Baptist, Brethren, Churches of Christ, Disciples of Christ, Evangelical United Brethren, Methodist, Nazarene, Presbyterian, Reformed, Salvation Army, United Church of Christ (Congregational-Christian-Evangelical and Reformed merger) denominations.

2. Liturgical denominations, namely the Lutheran churches, the Protestant Episcopal Church, and the Orthodox (Eastern) Catholic Churches. Some of the nonliturgical denominations named above are somewhat liturgical in practice.

3. "Liberal" denominations. The Unitarian-Universalist churches are the chief ones in this group.

4. Denominations with a distinctive doctrinal position, such as the Seventh Day Adventists, Latter-Day Saints (Mormon), Christian Science, Unity, and groups known as esoteric or mystical which claim to be in possession of truth that is unknown to ordinary mortals.

Únchurched. Many people who belong to no church are designated "Protestant" because they are not Catholic and have had some contact with Protestantism and Protestant clergy. They may be somewhat vague as to where they stand, what they believe, and what they want during a crisis such as serious illness or death.

Serious Illness or Death: No specific religious ministration is absolutely necessary to fulfill the requirements of most members of Protestant Churches. Belief in the "universal priesthood of believers" implies that it is not necessary that a clergyman be present, for each communicant is considered capable to minister without the mediation of a clergyman. However, most Protestants appreciate the presence of a clergyman to read the Scriptures, say prayers, hear confessions, administer Holy Communion and Unction of the Sick. There seems to be a general repugnance to the idea that any "last rites" are necessary. Some of the churches have fixed forms, rituals, or liturgies to be used, and particularly by clergymen of that particular denomination, but on the whole there is not the element of requirement to the degree experienced in the Roman Catholic religion.

Special Days: There is a wide variation in Protestant Churches concerning special days. Some groups go so far as to refuse all special days, stating that every day is holy and to be revered. Other groups have observances of certain special days similar to those of the Roman Catholic Church. There are varying degrees of observance of special seasons like Advent, Epiphany, Lent, Trinity, and Kingdom-time. It is not considered a mortal sin if church attendance is omitted; attendance is placed more

Pastor Ballinger is the former chaplain and director of clinical pastoral training at the University of Michigan Medical Center, Ann Arbor. This article is reprinted from his manual, "Religious Care for Hospital Patients." He is now pastor of the Methodist Church in Wilkinson, Ind.

on a voluntary basis. Many Protestants are quite zealous and regular in attendance every Sunday and other Holy Days, however.

Sacraments: Protestants consider that there are only two Sacraments: Baptism and Holy Communion. In some churches these are regarded as Ordinances rather than Sacraments. Other rites, such as Confirmation, Matrimony, Confession, Ordination, and Anointing of the Sick are usually observed, but are not considered in the same category as Sacraments. All these are celebrated or practiced in different ways by different groups. Sometimes any clergyman of any church or a devout layman may officiate; at other times only the properly designated clergyman may officiate. It is wise to consult with a chaplain who is well versed in these matters and let him interpret the meaning or advise the proper procedure.

Special Diets or Fasting: The Seventh Day Adventists have strict diet and food restrictions. Some are vegetarians while others adhere to regulations similar to those applicable to the orthodox Jew. Some denominations, notably the liturgical ones, observe the practices of fasting and abstinance similar to those applicable to the Roman Catholics but on a more voluntary basis.

Special Restrictions or Rules: Jehovah's Witnesses are absolutely opposed to blood transfusions. Usually it is futile to attempt to convince them to receive transfusions. It is generally considered wise to respect their wishes even if life is thereby endangered. As for minor children, the laws of many states make provision for the wishes of parents to be overruled in this matter when it is the medical opinion the child will die without transfusion. A court order should be obtained before the transfusion is made. If the patient is an adult, however, his decision should be respected.

Autopsy Permits: Practically no Protestant church or group has an official prohibition against autopsies, but individuals belonging to various groups are free to decide for themselves and may claim their religious beliefs forbid autopsies. The Chaplain or a clergyman of that particular group is often helpful in clarifying their decisions concerning signing or not signing the permit.

President's Page

(Continued from page 842)

Our scope in the legislature is limited to "health" bills. Therefore, we feel it is proper, when legislation in this area is proposed, that the views of medicine are taken into account. IMPAC helps make certain that they are!

Make certain you honor the voluntary contribution when you return your medical society dues. Join with the team that is protecting medicine and do your part. This does not mean that you should not give directly to the candidates of your choice; but don't overlook the greater impact to be gained by the pooling of medicine's resources for a concerted campaign effort in key districts.

Abe Lincoln's advice went something like this . . . "A person who contributes nothing to a political candidate gets all that he paid for . . . " i.e. nothing! Your "insurance premium" is your contribution to IMPAC. Make sure you get something worthwhile for the practice of medicine and the patients who depend on you.

Editorial

(Continued from page 841)

Dr. Morris deserves an "A" for effort, but the outcome is understandable. Hippies vary from clean bright youngsters to dirty filthy bums. Many receive financial aid from their parents who apparently are happy that they no longer have to put up with their shenanigans. In addition it gives the parents a good excuse for why Junior dropped out of school.

Hippies are an independent lot who believe there is more to life than work and responsibility. The movement will continue so long as it is supported and everything is free, including love. It will be interesting to follow the activities of these young people for 10 or 20 years to determine whether maturity will change their attitudes and habits. To date, they have not improved their lot thru education, neither have they produced nor contributed anything worthwhile.

T. R. Van Dellen, M.D.

^{1.} Three-Month-Old Hippie Clinic in San Francisco Closes Down. Med. Tribune, 1967.

MEETING MEMOS

Dec. 18—A joint meeting of the Chicago Society of Allergy and the American College of Chest Physicians will be held at the Blair House Restaurant, Chicago. A panel discussion of "Allergy, Infection, and Pulmonary Disease" will be presented after dinner. Dinner is at 7 p. m.

Dec. 19—"Ulcerative Colitis" will be the topic discussed by Samuel Hyman, M.D., F.A.C.P., Assistant Professor of Medicine at Northwestern University as part of the Columbus-Cuneo Medical Center *Medical Lectures*.

Dec. 21—Dr. M. R. Salem, Assistant Professor of Anesthesia at the University of Chicago will discuss "Deliber Hypotension Technics" at Cook County Hospital, Karl Meyer Hall, Room 112, 720 S. Wolcott, 8 p. m.

Dec. 24-Jan.1 —An International Health Show is scheduled for the New York Coliseum. The purpose of the show is "to permit firms and organizations to introduce new and existing health oriented products and services to the general public and institutional buyers and specifically to a fast growing segment of the public—the health conscious." Initial indications were that attendance may be over 250,000.

Dec. 26-31—The 134th annual meeting of the American Association for the Advancement of Science will be held at the American Hotel, New York. Attendance is expected to total over 10,000 with more than 85 symposia and special sessions scheduled.

Jan. 4—"Reliability and the Physics of Heredity" will be the topic of Dr. H. Pattee, of the W. W. Hansen Laboratories of Physics, Stanford University. The presentation is one in the Division of Biological and Medical Research Winter Seminars, Argonne National Laboratory, 9700 S. Cass Ave., Argonne.

Jan. 10-12—An intensive program on "Current Concepts in Cardiology" is being offered by the Institute for Cardiovascular Diseases at Good Samaritan Hospital, Phoenix, Ariz. The meetings will be held at Del Webb's Towne House. This is an official program of the American College of Cardiology.

Jan. 11-Dr. J. T. Lett of the Chester Beatty Research Institute, Institute of Cancer Research, Belmont, Sutton, Surrey, England, will present "The Repair of X-Ray Damage to the DNA of the Murine Lymphoma L5178r and the Bacterium M-Radiourans." This is one of the Winter Seminars at Argonne National Laboratory, 9700 S. Cass Ave., Argonne.

Jan. 11-13—The First International Conference on Prematurity, sponsored by the AMA Committee on Maternal and Child Care, will be held Jan. 11-13 at Pier 66, Ft. Lauderdale, Fla. The problems of prematurity will be explored in depth with particular emphasis on obstetrical prevention and pediatric intervention with the ultimate objective of reducing perinatal losses.

Jan. 14-18—Dr. John G. Bellows, Northwestern University Medical School, will preside over the annual meeting of the Society for Cyro-Ophthalmology, at the Statler-Hilton Plaza, Miami Beach.

Jan. 17-18—"The Treatment of Surgical Emergencies" is the theme of a two-day workshop and post-graduate continuation course sponsored by the Cleveland Clinic Educational Foundation, to be held in the Bunts Auditorium of the Education Building. "Trauma" will be discussed at the Wednesday sessions, with Thursday devoted to "Emergency Problems."

Jan. 17-19—A "Post Graduate Seminar in Nuclear Medicine" is being held by the Mallinckrodt Institute of Radiology, Washington University School of Medicine, St. Louis. An introduction to Nuclear Medicine will be presented on the 17th, while the meetings on the 18th and 19th will be devoted to Progress in Nuclear Medicine.

Jan. 17-Feb. 1—Reservations are being accepted for the Ninth Medical Seminar Cruise, a 15-day cruise from New York aboard the "Raffaello" of the Italian Line. Ports of call include Port Everglades, Florida, San Juan, St. Thomas, Curacao, La Guaira, Jamaica and Nassau. Sponsored by the Department of Postgraduate Medicine of Albany Medical College the cruise constitutes 24 hours of AAGP credit.

Jan. 18—The Division of Biological and Medical Research, Argonne National Labratory, 9700 S. Cass Ave., Argonne, will present Dr. D. Burk from the National Cancer Institute, Bethesda Maryland. His topic will be "Chemothermosensitization of Can-

(Continued on page 854)

Clinics for Crippled Children

Twenty-three clinics for Illinois' physically handicapped children have been scheduled for January by the University of Illinois, Division of Services for Crippled Children. The Division will conduct 18 general clinics providing diagnostic orthopedic, pediatric, speech and hearing examination along with medical social, and nursing service. There will be three special clinics for children with cardiac conditions and rheumatic fever, and two for children with cerebral palsy. Clinicians are selected from among private physicians who are certified Board members. Any private physician may refer to or bring to a convenient clinic any child or children for whom he may want examination or consultative services.

Jan. 3, Hinsdale-Hinsdale Sanitarium

Jan. 4, Flora-Clay County Hospital

Jan. 4, Cairo-Public Health Building

Jan. 4, Sterling—Community General Hospital

Jan. 4, Peoria Cerebral Palsy (A.M.)—Zeller Zone Center

Jan. 4, Springfield General—St. John's Hospital

Jan. 9, Peoria General—Children's Hospital Jan. 9, Quincy—St. Mary's Hospital

Jan. 9, East St. Louis—Christian Welfare Hospital

Jan. 10, Champaign-Urbana—McKinley Hospital

Jan. 10, Joliet–St. Joseph's Hospital

Jan. 12, Chicago Heights Cardiac–St. James Hospital

Jan. 17, Mt. Vernon—Good Samaritan Hospital

Jan. 17, Evergreen Park—Little Company of Mary Hospital

Jan. 18, Rockford — Rockford Memorial Hospital

Jan. 18, Decatur—Decatur & Macon County Hospital

Jan. 18, Elmhurst Cardiac—Memorial Hospital of DuPage County

Jan. 23, Peoria General—Children's Hospital

Jan. 26, Chicago Heights Cardiac–St. James Hospital

Jan. 30, East St. Louis-Christian Welfare Hospital

Jan. 31, Springfield Cerebral Palsy (P.M.)— Diocesan Center

Jan. 31, Elgin-Sherman Hospital

Jan. 31, Centralia-St. Mary's Hospital

The Division of Services for Crippled Children is the official state agency established to provide medical, surgical, corrective, and other services and facilities for diagnosis, hospitalization and after-care for children with crippling conditions or who are suffering from conditions that may lead to crippling.

In carrying on its program, the Division works cooperatively with local medical societies, hospitals, the Illinois Children's Hospital-School, civic and fraternal clubs, visiting nurse association, local social and welfare agencies, local chapters of the National Foundation and other interested groups. In all cases, the work of the Division is intended to extend and supplement, not supplant activities of other agencies, either public or private, state or local, carried on in behalf of crippled children.

Mental Health Guide

For the first time, a comprehensive guide to federal support of mental health research, training, and community services is available in one publication, National Institute of Mental Health Support Programs.

The new 54-page pamphlet describes the various types of support available through the seven NIMH Divisions. Summaries of NIMH funding mechanisms are divided into three program areas: research (basic, clinical, and applied), training, and community resources and services.

Each area outlines the support programs falling within its purview, identifies the NIMH offices responsible for administering each program, and reviews application procedures.

Brief looks are also taken at the total NIMH mission and organization, grant review procedures, grant application criteria, and other Department of Health, Education, and Welfare support programs related to mental health.

The publication is designed to guide the potential applicant to the most appropriate source of NIMH support. By describing in detail the types and kinds of support available and outlining procedures for applying for funds, the booklet answers most of an applicant's basic questions and therefore expedites the application process.

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CMS Inaugurates Wiggins

The first University of Health Sciences in the world was officially launched Nov. 9 when Walter S. Wiggins, M.D., was inaugurated first president of the University of Health Sciences and seventh president of The Chicago Medical School.

Herman M. Finch, Chairman of the Board of Trustees, presided at the ceremonies, which were attended by some 1,000 people. The processional was composed of an additional 250 representatives from the academic, medical, scientific and civic communities, as well as institutions of higher learning. The total audience represented many major cities in the United States and

abroad.

Mr. Finch, upon inaugurating the new president, said: "The University of Health Sciences is being launched with the complete and enthusiastic support of the Board of Trustees, which has appointed Dr. Wiggins with great confidence."

After accepting his presidencies, Dr. Wiggins delivered an address, "The Cause and Shape of Profound Change in Health Education," indicating his personal aspirations for the newly created University of Health Sciences.

In another part of the ceremony, Dr. Wiggins was awarded a citation from the United States Department of State, for his work as former Director of the AMA-USAID Viet Nam Medical Education Project.

Before joining The Chicago Medical School earlier this year, Dr. Wiggins was Secretary of the Council on Medical Education of the AMA, as well as Director of the Viet Nam Project. He remains as Consultant to the latter program.

The inaugural address was given by W. Clarke Wescoe, M.D., Chancellor of the University of Kansas and former Chairman of the AMA Council on Medical Education. Saluting the new University of Health Sciences, he said: "The meaningful intermingling of the health profession is the school's greatest challenge. The plans for expansion of the health sciences is to be applauded. Particularly, the community should be interested, for here lies great opportunity for educational development of the disadvantaged and the culturally deprived."

The inauguration was followed by a luncheon in the Continental Plaza Hotel, at which Mayor Richard J. Daley was the main speaker. Mayor Daley proclaimed the day "University of Health Sciences—The Chicago Medical School Day," as "a testimony of the great interest and staunch support on the part of the City of Chicago and its citizens in the noble mission that this institution has undertaken."

After the luncheon, a series of seminars, "Health Services and Medical Education" was presented. Participants were: Dr. Wiggins; Philip R. Lee, M.D., Assistant Secretary, Health and Scientific Affairs, Department of Health, Education and Welfare; Mr. Greer Williams, medical science writer, and Member of the National Advisory Committee of The Chicago Medical School; Julius B. Richmond, M.D., Dean, The Medical Faculty, State University of New York; James Z. Appel, M.D., past president, AMA; and Prof. Tom Mc-Keowns of England, Prof. Paul Speiser of Austria, Dr. John F. McCreary of Canada and Prof. I. Halbrecht of Israel.

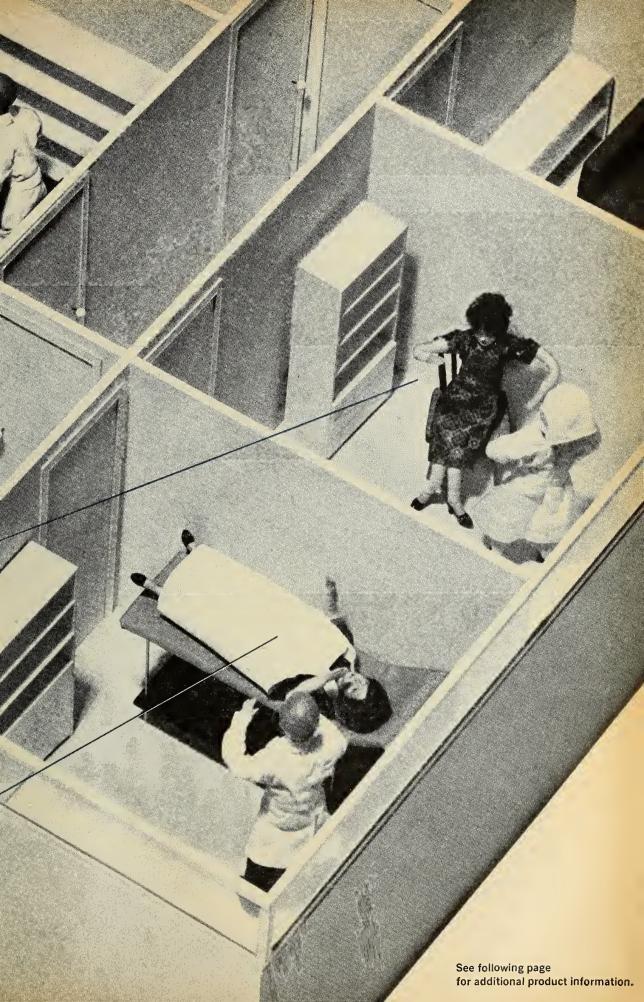
Meeting Memos

(Continued from page 845)

cer Cells in Selective Multiple Therapy." This part of the Winter Seminar series at Argonne.

Jan. 18-20—A National Conference on "The Community and Emergency Medical Services" sponsored by the AMA Committee on Emergency Medical Services, will be held at the San Francisco Hilton. The purpose of the conference is to identify, coordinate and implement all aspects of First Aid and emergency care, transportation of ill and injured, emergency communications and emergency facilities.

Jan. 21-31—A 10-day program of instruction in head and neck plastic surgery will be conducted at Chicago's Cook County Hospital Graduate School of Medicine. The sessions will consist of two consecutive five day seminars designed primarily for hospital staff members actively engaged in residency teaching in otolaryngology departments. Registration limited to 40 at each session.



When the emotionally impaired patient pays an office call...

Anxiety that seriously interferes with the individual's performance at work, at home, or in the community may be regarded as moderate to severe in degree.

Mellaril often recommends itself to the treatment of moderate to severe anxiety because it

- helps control the most frequent symptoms: marked tension, agitation, apprehension, restlessness, hypermotility
- often alleviates anxiety-induced somatic complaints
- frequently helps strengthen emotional resources
- helps the patient maintain realistic contact with environment, closer harmony with family

Thus, when you consider the anxiety moderate to severe...consider Mellaril.

Contraindications: Severely depressed or comatose states from any cause, and in association with or following MAO inhibitors; severe hypertensive or hypotensive heart disease.

Precautions: Hypersensitivity reactions (e.g., leukopenia, agranulocytosis) and convulsive seizures are infrequent. Pigmentary retinopathy has been observed where doses in excess of those recommended were used for long periods of time. May potentiate central nervous system depressants, atropine, and phosphorus insecticides. Where complete mental alertness is required, administer the drug cautiously and increase dosage gradually. In addition, orthostatic hypotension (especially in female patients) has been observed. Epinephrine should be avoided in treatment of drug-induced hypotension.

Side Effects: Pseudoparkinsonism and other extrapyramidal disorders are infrequent; drowsiness, especially in high doses early in treatment, may occur; nocturnal confusion, dryness of the mouth, nasal stuffiness, headache, peripheral edema, lactation, galactorrhea, and inhibition of ejaculation are noted on occasion; photosensitivity and other allergic skin reactions may occur but are extremely rare.

Before prescribing, see package insert for full product information.

Mellaril (thioridazine)
25 mg. t.i.d.

Community Medicine

(Continued from page 834)

life of the community as a participant observer as he works in concert with the practicing physician and the local health officer but under the supervision of full-time faculty.

The teaching and research programs in the state are being expanded with outlying teaching centers under the direction of a "field professor".

Finally the teaching program in Community Medicine is under constant self scrutiny, with continuing attempts being made to improve evaluation methods.

View Box

(Continued from page 825)

DIAGNOSIS: Lesser sac abscess.

Anatomically the lesser sac is formed anteriorally by a peritoneal reflection which runs down and laterally to the lesser curvature of the stomach and duodenum. Continuing laterally it covers the posterior surface of the stomach and is reflected onto the spleen as the posterior layer of gastrolienal ligament. The peritoneum covering the posterior wall lesser sac covers the anterior surface of the inferior vena cava, pancreas, suprarenal gland and left kidney. The left lateral boundary of the lesser sac is the pedicle of the spleen where gastrolienal and lienorenal ligament join.

The signs of collection of gas and fluid in the lesser sac are as follows:

- 1) Displacement of the stomach anteriorally, superiorally and to the right.
- 2) Typically there is a large left sided soft tissue density with an oblique lower border that runs laterally and downward. Abscesses originating in the pancreas may fill the lesser sac with multiple small gas collections or if coalescent with long retrogastric fluid levels. In the erect position the upper margin of the gas has a round contour but doesn't reach the level of the diaphragm.

Reference

Radiological Signs of Disease in Lesser Peritoneal Sac. H. Z. Mellins Radiologic Clinics of N. Amer., Vol. II, No .1, April 1964.

The Physician's Career: A New AMA Publication for Physicians

Despite the remarkable changes which have occurred in patterns of medical practice, the enormous expansion of professional and occupational resources on the allied health team and the explosive growth of community health services involved in total health care within the past generation, few changes have been made in the medical school curriculum to help prepare the new physician to grasp, appreciate and meet these accelerating socio-economic challenges once he enters practice.

As a step toward surmounting this educational void, the American Medical Association has developed a new publication, *The Physician's Career*, a 99-page handbook intended to serve as a teaching outline on medical practice and community relations for physicians and medical students.

More than two years in the making, The Physician's Career was the direct result of suggestions made at recent meetings of the House of Delegates that teaching outlines of informative material on medical ethics, medical civics and socio-economic aspects of medical practice be provided to medical schools and medical societies for orienting students and recent graduates to non-scientific aspects of the physician's career.

Fifteen AMA departments and a task force of staff consultants cooperated in producing *The Physician's Career*, the most significant publication covering this broad subject since Joseph Garland, M.D., Boston, introduced *The Physician and His Practice* in 1954. Henry F. Howe, M.D., Director of the Department of Occupational Health, served as coordinating editor.

Prepared in narrative outline form, The Physician's Career is comprised of 15 chapters, divided into two parts—The Practice of Medicine and The Physician in the Total Community.

The handbook focuses upon the sharp transition which has occurred since two generations ago when the unaided physician was almost the only health resource in the community.

It calls attention to the fact that the short-term general hospital, once a place of last refuge for the terminally ill, has emerged into a highly organized, complex institution serving as a center of medical practice and providing the supporting services demanded by modern medical care.

A major change, it points out, is the rapid evolution of group practice. Since 1948, when 3,493 physicians practiced in 368 groups, the number in group practice had more than septupled to approximately 26,000 by 1965 and is continuing to accelerate, according to preliminary information gathered in a detailed survey now being conducted by the AMA.

Chapter topics of Part One are Patterns of Medical Practice, Licensure and Accreditations, Organizations of the Health Professions, Medical Ethics, Medical Staff Organization and Responsibilities, Teaching and Research, Business Aspects of Medical Practice and Medicolegal Obligations and Relations.

Chapter topics of Part Two are Community Health Services, Voluntary Health Agencies, Governmental Health Programs, The Modern Public Health Movement, Voluntary Health Insurance and Prepayment Plans, Medical Cultism and Quackery, and Personal, Family and Civic Responsibilities.

The AMA is encouraging state and county medical societies to utilize *The Physician's Career* as a springboard of ideas for orientation seminars for newly installed members. Copies are being provided free to members of this year's senior medical school classes. Review copies are being sent to all state and county medical societies and medical schools.

For others, single copies are available at 75 cents each from the AMA Order Department (90 cents to those in all countries except the U.S., its possessions, Canada and Mexico.) A reduced price of 45 cents a copy has been set for medical students, interns and residents.

At midyear 1967, the Veterans Administration had guaranteed or insured 6,690,744 home loans which totaled more than \$66 billion, and had disbursed 274,127 direct loans amounting to \$2.5 billion in rural areas where ordinary lending facilities were not available to veterans.

863

Does The Psychiatric Hospital Serve Medicine?

Some treatment facilities seem to provide an unusual measure of aid and comfort to other disciplines, with the doctor's role apparently subsumed in a kind of miscellany of therapeutic activity.

This is not the case at North Shore Hospital. In policy and in practice, the doctor creates the program and treatment regime, drawing upon relevant aspects of the existing milieu to structure his patient's day.

While obviously beneficial and entirely necessary in patient management, the therapeutic environment must be astutely scaled to specific patient needs, as interpreted by the attending physician.

Patients referred to the hospital by the general practitioner and other medical specialists are cared for by the hospital's own psychiatric staff which, at the same time, provides continuity of care for all patients.

Hospital administration and medical responsibility are under one and the same person at this hospital: the superintendent and psychiatrist-in-chief. Consequently, patient welfare, and nothing else, defines hospital organization and the therapeutic programs.

The private psychiatric facility, as compared to other institutions and units of care, remains especially suited to the treatment of a wide range of mental disease entities. This is true in those instances where the patient is ambulatory, in need of relative freedom, and where an appropriate diversity of activity is indicated. Those conditions of daily living, in other words, which are required for the therapeutic rehearsal of recovery are uniquely available in such a hospital.

The remotivation programs for the medicare patients, the class rooms for the adolescents, the patient library, the outdoor and indoor games and parties, all of these professionally organized activities make up the hospital dav-but again with sharp medical emphasis. Through weekly staffings, written orders, and discussions with staff the doctor remains entirely in command.

The hospital, in fulfilling its medical commitments, stands ready to offer consultation on office and home emergencies. In short, it is here (in a strikingly beautiful section of the North Shore) to serve doctors by keeping faith with the profession of medicine.

Telephone or write to Charles H. Jones, MD-Superintendent and Psychiatrist-in-Chief, North Shore Hospital, 225 Sheridan Road, Winnetka, Illinois 60093 -Telephone (312) 446-8440.

NEW **PHARMACEUTICAL SPECIALTIES**

by Paul deHaen

For detailed information regarding indications, dosage, contraindications and adverse reactions, refer to the manufacturer's package insert or brochure.

Single Chemicals-Drugs not previously known, including new salts.

Duplicate Single Products-Drugs marketed by

more than one manufacturer.

Combination Products—Drugs consisting of two or more active ingredients.

New Dosage Forms-Of a previously introduced product.

NEW SINGLE CHEMICALS

NAVANE Antaraxic \mathbf{R} Manufacturer: J. B. Roerig & Co. Nonproprietary Name: Thiothixene Indications: Acute and chronic schizophrenia.
Contraindications: Circulatory collapse, comatose states, central nervous system depression due to any cause, blood dyscrasias. Not for children under 12 years. Dosage: Must be individually adjusted. Range:

6-60 mg. daily. Supplied: Capsules-1, 2, 5 and 10 mg.; bottles of

DUPLICATE SINGLE PRODUCTS

CYREDIN Hematinic \mathbf{R} Manufacturer: The Wm. S. Merrell Co. Nonproprietary Name: Cyanocobalamin Indications: Parenteral treatment of pernicious and megaloblastic anemias. Contraindications: None known.

Dosage: 15 to 50 mcg., i.m., 2-3 times weekly until remission, then 100 mcg. monthly to prevent relapse.

Supplied: Ampuls-1 mg./cc.; boxes of 25 and 100. Vials-1 mg./10 cc. and 10 mg./10 cc.; boxes of 1 and 25.

DUPLICATE SINGLE PRODUCTS

PRINCIPEN Antibiotic-Penicillin Manufacturer: E. R. Squibb & Sons Nonproprietary Name: Ampicillin Trihydrate Indications: Genitourinary, respiratory, and gastrointestinal tract infections due to sensitive strains of Gram-negative bacteria. Other infec-

tions due to susceptible organisms. Contraindications: History of allergic reactions to any of the penicillins, in infections caused by

penicillinase-producing organisms.

Dosage: 250-500 mg. q.i.d. in equally spaced doses.

Supplied: Capsules-250 mg.

Powder for oral suspension-250 mg./5 cc. TYBATRAN Ataraxic

 \mathbf{R} Manufacturer: A. H. Robins Co. Nonproprietary Name: Tybamate Indications: Treatment of anxiety and tension components of psychoneuroses, senile agitation, depressive symptoms associated with anxiety. Contraindications: Hypersensitivity to the drug,

(Continued on page 866)

pregnancy.



Help her regain equanimity

Mebaral brand of mephobarbital

TABLETS | 32 mg. (½ grain) 50 mg. (¾ grain) 100 mg. (1½ grains) For the anxious patient who must think clearly all day long, Mebaral usually provides dependable sedation without the degree of languor or decrease in alertness caused by other barbiturates.¹

Mebaral is of value in the treatment of anxiety-tension states² when minimal hypnotic action is desired. Its sedative action is prolonged³ and predictable.

Dosage: Adults, for daytime sedation—1/2 grain (32 mg), 3/4 grain (50 mg.) and, at times, 11/2 grains (100 mg.), three or four times daily. Side effects: Although Mebaral is generally well tolerated over long periods, the possibility of idiosyncrasy to barbiturates (as manifested by drowsiness, vertigo and cutaneous eruptions) should be considered. As with other barbiturates, caution is advisable during use in debilitated and senile patients and in patients with pulmonary disease.

References: 1. Musser, Ruth D., and Shubkagel, Betty L.: Pharmacology and Therapeutics, ed. 3, New York, Macmillan Company, 1965, p. 363. 2. Council on Drugs, American Medical Association: New Drugs 1965, Chicago, American Medical Association, 1965, p. 157. 3. Modell, Walter (Ed.): Drugs in Current Use 1966, New York, Springer Publishing Company, Inc., 1966, p. 77.

Large doses are contraindicated in patients with nephritis.

Dependable daytime sedation

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Each tablet contains:

Potassium Iodide195	mg.
Aminophylline130	
Phenobarbital, Caution: May be habit forming 21	
Ephedrine HCl 16	mg.

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Precautions: Usual for aminophylline-ephedrinephenobarbital. Iodides may cause nausea, long use may cause goiter. Discontinue if symptoms of iodism develop.

Iodide contraindications: tuberculosis, pregnancy.

DOSAGE

One tablet, with full glass of water, 3 or 4 times daily.

Dispensed in bottles of 100 and 1000 tablets.

MUDRANE GG-Formula, dosage and package identical to Mudrane—except—100 mg glyceryl guaiacolate replaces the potassium iodide. The value of Mudrane cannot be enjoyed by a small group in which K.I. is contraindicated. Mudrane GG is prepared for this group.

MUDRANE GG ELIXIR—Four 5 cc teaspoonfuls is equivalent to one Mudrane GG tablet. Dosage adjusted to age and weight of child. Mudrane GG Elixir is for pediatric patients and those who think they cannot swallow tablets. Dispensed in pint and half gallon bottles.

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New Pharmaceutical Specialties

(Continued from page 864)

Dosage: Adults: 250-500 mg. three or four times

Children 6 to 12 years: 20-35 mg./kg. body weight divided into three or four equal doses. Not for children under 6 years.

Supplied: Capsules-125, 250 and 350 mg.; bottles of 100 and 500.

COMBINATION PRODUCTS

ALPHOSYL SHAMPOO Dermatologic Prep.-Coal Tar o-t-c

Manufacturer: Reed & Carnrick Composition: Coal tar extract 5%

Hexachlorophene 1% Indications: Psoriasis and other scalp conditions,

including dandruff, Contraindications: None mentioned.

Dosage: As required.

Supplied: Tubes-2 oz.

COMBINATION PRODUCTS

o-t-c

o-t-c

 \mathbf{R}

CONSOTUSS Cough Presparation Manufacturer: The Wm. S. Merrell Co.

Composition: Each 5 cc. contains: Dextromethorphan HBr 15 mg. Glyceryl guaiacolate 100 mg. Doxylamine succinate 3.75 mg. Chloroform 0.5 % Alcohol 10 %

Indications: Non-narcotic preparation for the temporary relief of cough.

Contraindications: None mentioned.

Dosage: Adults-1 or 2 tsp. q.4-6h., not to exceed 8 tsp./24 hours.

Children (6-12 years)-1 tsp. q.4h., not to exceed 4 tsp./ 24 hours.

Children (2-5 years)-½ tsp. q.4h., not to exceed 2 tsp./24 hours.

Supplied: Bottles-6 and 16 fluid ounces.

NEW DOSAGE FORM

ROBITUSSIN*- DM Cough Calmers

Cough Preparation Manufacturer: A. H. Robins Co.

Composition: Each lozenge contains: Glyceryl guaiacolate 50 mg.

Dextromethorphan HBr 7.5 mg. Indications: Relief of cough.

Contraindications: None mentioned. Dosage: As directed.

Supplied: Lozenges-box of 18.

TUSSEND Tablets Cough Preparation Manufacturer: Pitman-Moore

Composition: Hydrocodone bitartrate 5 mg. Phenylephrine HC1 20 mg.

Chlorpheniramine maleate 4 mg.

Indications: Respiratory tract infection accompanied by exhausing cough spasms.

Contraindications: Hypersensitivity to any of the ingredients. Do not use over an extended period of time since hydrocodone may cause addiction.

Dosage: One tablet 3 or 4 times daily. Supplied: Tablets-bottles of 100.



after Surgery

B and C vitamins are therapy: Therapeutic amounts of B and C in stress formula vitamins often are vital during periods of physiologic stress. STRESSCAPS capsules, designed to meet increased metabolic demands, aid in achieving a more comfortable convalescence, a more rapid recovery. After surgery, as in many stress conditions, STRESSCAPS vitamins are therapy.





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Vitamin B₂ (Riboflavin)

Vitamin B₁ (Ryidoxine HCI)

Vitamin B₁ (Pyridoxine HCI)

Vitamin C (Ascorbic Acid)

Niacinamide

Calcium Pantothenate

Recommended intake: Adults, 1 capsule
daily, for the treatment of vitamin deficiencies. Supplied in decorative "reminder"
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Opinions and Reports on Ethical Relations

Relation of Physicians and Hospitals

A physician should not dispose of his professional attainments or services to any hospital, corporation or lay body by whatever name called or however organized under terms or conditions which permit the sale of the services of that physician by such agency for a fee.

Where a hospital is not selling the services of a physician, the financial arrangement if any between the hospital and the physician properly may be placed on any mutually satisfactory basis. This refers to the remuneration of a physician for teaching or research or charitable services or the like. Corporations or other lay bodies properly may provide such services and employ or otherwise engage doctors for those purposes.

The practice of anesthesiology, pathology, physical medicine and radiology are an integral part of the practice of medicine in the same category as the practice of surgery, internal medicine or any other designated field of medicine.

A physician should not enter into a contract or agreement with a hospital whereby the hospital acts as the agent for a physician unless it is with the consent of the physician and of the medical staff. The physician and the medical staff, as principals, should not approve any contract whose terms or conditions are inconsistent with the "Principles of Medical Ethics" and established policy of the American Medical Association. (House of Delegates, 1951-63-64)

Anesthesia A Medical Service

We emphasize our insistence that anesthesia is a medical service and therefore should always be under the direction and supervision of a physician who assumes the responsibility and who should present his bill for services. No hospital or individual without a license to practice medicine should be permitted to collect the fee for anesthesia. (House of Delegates, 1948)

Hospital Emergency Room

The Council considered the policy of certain hospitals under which physicians are employed on a salary to provide professional medical care in the emergency room on the theory that emergency service in the hospital appears to have developed as an essential hospital function.

The Council noted that the official policy of the American Medical Association as adopted by the House of Delegates in 1951 and reaffirmed as recently as June, 1960, states that a physician should not dispose of his professional services to any hospital, corporation or lay board by whatever name called under terms or conditions which permit the sale of the services of that physician by such agency for a fee. In the opinion of the Council, the action of a physician in accepting a salaried position offered by the hospital in a case such as described is not consonant with the policy of the AMA.

The Council agreed that one possible solution to staffing an emergency room is to have the medical staff form itself together into a medical partnership for the purpose of employing a physician whose duties among others would include taking care of emergency cases in the hospital. The physician would be the employee or agent of the staff rather than the hospital. (Judicial Council, 1961)

Association of Pathologist and Laboratory Technician

The Council considered a proposed as sociation between a pathologist and a licensed technician to operate a medical laboratory.

The Council was of the opinion that a proposal would involve an improper division of professional income with a lay person. Under such an arrangement, the lay technician would have a direct financial interest in the productivity and fees earned by the pathologist. For this reason, the Council agreed that such a plan would be unethical. (Judicial Council, 1963)

(Continued on page 878)

-OBITUARIES-

*Dr. O. H. Ball, Bloomington, died Oct. 17 at the age of 66. He had practiced medicine in Bloomington for over 39 years and was a past president of McLean County Medical Society. He also served several terms as delegate member of the ISMS Maternal Welfare Committee, and was a member of the staff at St. Joseph's and Mennonite Hospitals, where he taught obstetrics and gynecology in the Schools of Nursing.

Dr. Lewis S. Barger, retired Golconda physician, died Oct. 27 at the age of 83 in Paducah, Ky. He was a past secretary of the Pope County Medical Society and had practiced in Golconda for 59 years.

Preventive Opthalmology

(Continued from page 828)

children's eyeglasses are equipped with thin foils of a type of contact paper of varying densities, and the amount of occlusion can be increased gradually until it becomes total. The acuity in the better eye is gradually decreased in eight steps. For example: The least dense foil allows almost complete vision—0.9 or 20/25. The next increase in density allows 0.8 or 20/30 vision. The third foil allows the better eye to attain 0.6 or 20/30 to 20/40. This method can be used in reverse if the ophthalmologist wishes to allow gradual reduction of occluson.

Albinism and Aniridia

Decreased visual acuity is associated with aniridia and albinism in most cases. The pathophysiology of this decrease is poorly understood but in a series of 134 aniridic eyes 14 per cent had a visual acuity of 20/70 or better. While macular aplasia may be responsible for many cases with faulty vision, the probability exists that some cases may have amblyopia associated with visual sensory deprivation due to excessive contour aberration and dazzle in a visually immature eye. It is possible to fit aniridic and albinotic infants at birth with pinhole scleral or corneal contact lenses in an attempt to present the infantile macula with a sharp contoured non-dazzling image. Results of this prophylactic program will take several years to judge.

Dr. Sumitr Chutrsupakul, 32, of Thailand, and his wife Dangtoy, died as a result of an automobile accident on Nov. 7 in Michigan City, Ind. He was a neurosurgeon on the staff at Cook County Hospital.

*Dr. Robert E. Driscoll, Chicago, died Nov. 2 at the age of 61. He had served in World War II and had practiced in the Chicago Lawn area for 21 years.

*Dr. Jeanette Hork, Chicago, died Nov. 16 at the age of 66. She was on the staff at Mt. Sinai Hospital.

*Dr. Joseph Nebrensky, 52, Riverside, died as a result of a fall on Oct. 27. He had been a major in the medical corps during World War II and was a member of the Douglas Park branch of the Chicago Medical Society.

*Dr. S. E. Oxford, a retired Cave-in-Rock physician, died on Oct. 23 at the age of 83. He was a past president of the Harding County Medical Society.

*Dr. Arthur S. J. Peterson, a retired Chicago radiologist, died Nov. 10 at the age of 74. He was a former staff member of Roseland Community Hospital, and was a member of the Chicago Roentgen Society as well as an emeritus member of ISMS. *Dr. Evsay Prilla, a retired Chicago physician, died Oct. 27 at the age of 85. An emeritus member of ISMS, he was on the staff at Norwegian-American Hospital before his retirement 10 years ago.

*Dr. George Jay Rivard, Jr., a retired Decatur physician, died Nov. 2 at the age of 76. He had practiced in Decatur since 1921 and specialized in industrial medicine and surgery.

Dr. William Morten Rogers, Martinsville, died on Oct. 13 at the age of 82. He had practiced medicine in Martinsville since 1909. He was past president of Clark Medical Society and a member of the staff at Paris Hospital.

*Dr. James R. Smith, Chicago, died Nov. 14 at the age of 79. He had practiced medicine in the Chicago area for 50 years as an EENT specialist and was on the staff of Christ Community Hospital. He was a member of the ISMS 50 Year club.

*Dr. Alfred Wickstrom, formerly of Chicago, died in Sullivan on Oct. 28 at the age of 89. He retired in 1957 after practicing medicine for over 50 years.

COOK COUNTY

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STARTING DATES—1967-1968

SPECIALTY REVIEW COURSE IN SURGERY, Part II, March 4
SPECIALTY REVIEW COURSE IN MEDICINE, Part II, March 4
SPECIALTY REVIEW COURSE IN ORTHOPEDICS, December 11
SPECIALTY REVIEW COURSE IN THORACIC SURGERY, April 1
PATHOLOGY REVIEW COURSES FOR SPECIALTIES, Request

PROCTOSCOPY & VARICOSE VEINS, One Week, December 11
SYMPOSIUM ON SHOCK, Two Days, December 15
ESSENTIALS OF PLASTIC SURGERY, One Week, April 1
FLUIDS & ELECTROLYTES, One Week, April 22
ADVANCES IN FRACTURES & ORTHOPEDICS, March 11
VAGINAL APPROACH TO PELVIC SURGERY, One Week, December 11

GYNECOLOGY, Office & Operative, One Week, March 25
OBSTETRICS, General & Surgical, One Week, April 1
RADIOISOTOPES, One or Two Weeks, by appointment
BASIC ELECTROCARDIOGRAPHY, One Week, March 11
BASIC INTERNAL MEDICINE, One Week, April 22
ANESTHESIA, Inhalation, Endotracheal, Regional, Request
Dates

Information concerning numerous other continuation courses available upon request.

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Dr. Hopkins, Medical Society Leader, Dies

Percy Earl Hopkins, M.D., past-president of the Illinois State Medical Society, died Oct. 27 at his home in Chicago. He was 75 years old.

Born in Orland, he received his medical training at the Chicago College of Medicine and Surgery and his M.D. degree from Valparaiso University in 1916. After an in-



ternship at Evangelical Hospital, Chicago, in 1917 he joined the army, reaching a captaincy in the medical corps and serving with the French at Verdun.

Upon his return to civilian life in 1919, Dr. Hopkins joined the Chicago Medical Society, becoming a

member of the Council in 1930. Six years later he joined the Illinois State Medical Society Council and served until 1950 as a member of the Board of Trustees. He was president of the Society in 1949. Elected a delegate from Illinois to the AMA, Dr. Hopkins served in this capacity for eight years until 1959 when he was elected to the Board of Trustees. In 1962 he became chairman of the Board and was re-elected each year until he declined re-nomination in 1965.

Specialized society membership was held as a Fellow of the American College of Surgeons and Dr. Hopkins was a member of the Council of the Chicago Medical Society, chairman of the Advisory Committee to the Veterans Administration, president of the Blue Shield Plans Board of Trustees, and a member or chairman of more than 15 standing committees of the ISMS at different times. He served as president and chief of staff at Evangelical Hospital, president of Christ Community Hospital, and chief of Medinah Medical Staff through membership in Auburn Park Lodge 789, AF & AM.

In 1920 Dr. Hopkins married Leonora C. Nuessle, who survives him, as do two sons Robert J. and William C., M.D., and two grandchildren.

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Annual Public Affairs Roundup to be Jan. 30-Feb. 1 in Washington

RESERVE THE DATES OF JAN. 30—FEB. 1 for the 1968 Annual ISMS Public Affairs ROUNDUP in Washington! An exciting and educational three days in Washington, D.C. is being planned by the Public Affairs Committee of the Illinois State Medical Society.

In the past, a large group of physicians their wives have attended ROUNDUP which is held in conjunction with the Association Public Affairs Conference of the Chamber of Commerce of the United States. Every year the National Chamber sponsors a two-day conference on public affairs. Physicians and wives travel to Washington a day early to participate in a program sponsored by the Illinois State Medical Society geared for the participants' information and enjoyment. ROUNDUP activities will include: a trip to the "Hill" to visit Illinois Congressmen and Senators, a foreshadowing of what's to come in this most-important election year, and an opportunity to gain firsthand information on recent political developments.

Last year ISMS guest speakers included: Robert Novak, of the Evans and Novak "Inside Report"; Neal Peirce, Political Editor of the Congressional Quarterly; David Broder, columnist for the Washington Post and Ray Hoewing, Director of Public Affairs, The Public Affairs Council—ECO

Highlighting the ISMS program will be a dinner-reception with members of the U.S. House of Representatives and Senate from Illinois. So, your visit to Washington will enable you to: (1) enjoy this wonderful city—our nation's capital; (2) learn more about the governmental processes and hear experts tell you what's in store for the '68 elections; and (3) build a useful and working rapport with our elected representatives.

Plan to attend the Washington ROUND-UP. Details will follow. For advance information, write to the Division of Legislation and Public Affairs of the Illinois State Medical Society, 360 N. Michigan Ave., Chicago, 60601.



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Ethical Relations

(Continued from page 868)

Relation Between Psychiatrists and Psychologists

The Council considered the relationship of psychiatrists and practicing licensed psychologists and reaffirmed its opinion that the doctor could not delegate to the psychologist any matter requiring the exercise of professional medical judgment. (Judicial Council, 1962)

Practice of Medicine by Corporations

It was decided long ago that the practice of law by a corporation was against public policy and the same has been prohibited by law in many states. The relations between patient and physician are more intimate than are those between client and attorney. It is impossible for that intimacy of relationship to exist between an individual and a corporation and if it is against public policy for a corporation to practice law, how much more so must it be for a corporation to practice medicine. (House of Delegates, 1922)

Practice of Medicine by Corporations

With regard to the practice of medicine by corporations, it is the opinion of the Judicial Council, that such practice is detrimental to the best interests of scientific medicine and of the people themselves. When medical service is made impersonal, when the humanities of medicine are removed, when the coldness and automaticity of the machine are substituted for the humane interest inherent in individual service and the professional and scientific independence of the individual physician, the greatest incentive to scientific improvement will be destroyed and the public will be poorly served. (House of Delegates, 1930)

Practice under Compensation Laws

Communications have raised certain questions as to conditions of medical practice under existing compensation laws. These questions concern those provisions of such laws which appear to encourage the practice of medicine by corporations, to curtail the privileges of the individual employee with respect to the free choice of his medical attendant, to interfere with the rights and privileges of physicians not connected

with corporations, and also to touch on matters of ethics.

The American Medical Association cannot control legislation or the administration of law. The compensation acts of the various states differ widely in their provisions affecting the questions mentioned. Some of them are manifestly inequitable as they affect the practice of medicine and the best interests of employees and the public. The remedy must be sought at the hands of legislatures in several states, and it would seem to be the responsibility of the constituent state association to instigate measures seeking relief. The individual state medical association, as it holds original jurisdiction in such matters, must consider these questions, deal with them in the light of the law, and seek to effect needed corrections. (House of Delegates, 1929)

Hospital and Health Associations

In previous reports, the Council has referred to organizations controlled by groups of laymen, or by individuals, offering medical and hospital service to any who will buy "membership" and pay a nominal sum each month as "dues." The Judicial Council has regarded these schemes as being economically unsound, unethical and inimical to the public interest.

The members of the Judicial Council doubt that it is wise to lead the people in any community to believe that all necessary medical and hospital service, even through chronic diseases and obstetric care be excepted, can be provided for the average family for \$35 a year. (House of Delegates, 1929)

Group Practice

Resolved, That the House of Delegates affirm that it is within the limits of ethical propriety for physicians to join together as partnerships, associations or other lawful groups provided that the ownership and management of the affairs thereof remain in the hands of licensed physicians. (House of Delegates, 1957)

ETHICAL RELATIONS COMMITTEE
Willard C. Scrivner, M.D., Chairman
J. Ernest Breed, M.D.
George E. Giffin, M.D.
William M. Lees, M.D.

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